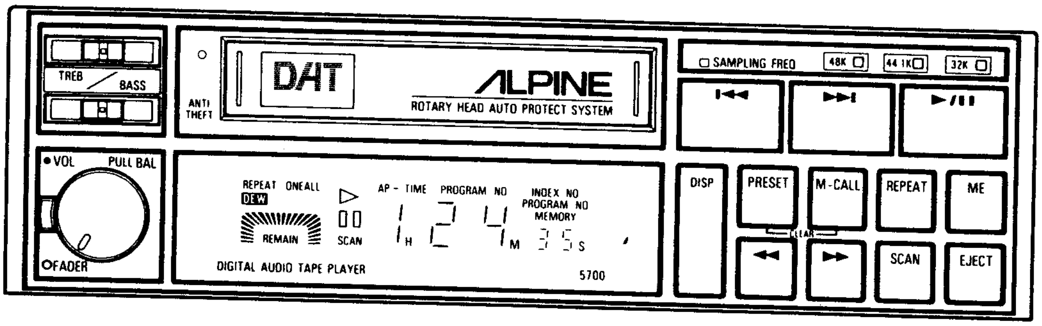
ALPINE SERVICE MANUAL

Digital Audio Tape Deck


TREB
BASS
ANTI THEFT
DAT
ALPINE
ROTARY HEAD AUTO PROTECT SYSTEM
SAMPLING FREQ
48K
44.1K
32K
VOL
PULL BAL
FADER
REPEAT ONEALL
DEW
REMAIN
SCAN
AP - TIME
PROGRAM NO
INDEX NO
PROGRAM NO
MEMORY
1.24 H M 35 S
DIGITAL AUDIO TAPE PLAYER
5700
DISP
PRESET
M-CALL
REPEAT
ME
CLEAR
SCAN
EJECT

5700

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Specifications

DIGITAL AUDIO TAPE PLAYER

Signal to Noise Ratio (1kHz, 0dB)	80dB
Distortion (1kHz, 0dB)	0.015%
Frequency Response (1kHz, 0dB, 48kHz Sampling)	20Hz ± $^{1}_{2}$dB
	100Hz ± $^{1}_{1.5}$dB
	10kHz ±1dB
	20kHz ±2dB
Separation (30kHz Standard)	1kHz 60dB
	10kHz 50dB
FF & REW Time (R-120)	75sec.
Noise Level (1kHz, 0 Level, Vol : Min)	0.1mV
Channels (Stereo)	2 channels
Quantizing Bit Number	16 bit Linear System

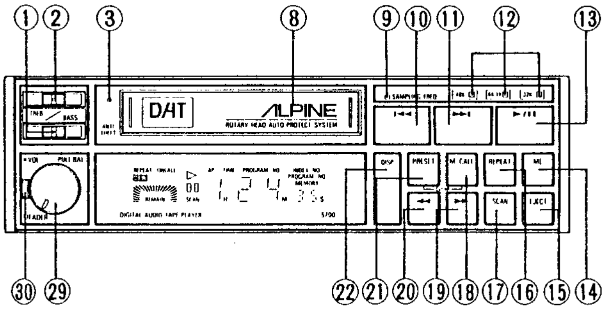
DIGITAL AUDIO TAPE GENERAL SPECIFICATIONS

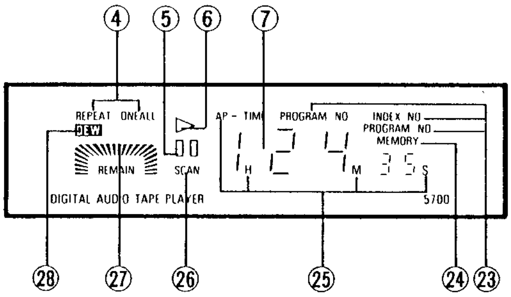
Track Pitch	13.6 μ m
Modulation Frequency	48kHz, 44.1kHz, 32kHz
Transfer Bit Rate	2.46Mbit/sec.

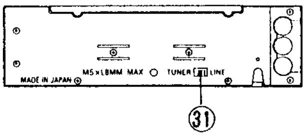
GENERAL

Rated Power Supply	DC14V
Impedance	10k ohm
Pre-output	1800mV
Semi-conductors	56 IC's, 64 Transistors, 1 FET, 22 Diodes, 17 Zener Diodes
Dimensions (W) × (H) × (D)	Nose : 178 × 50 × 15 (mm)
	Chassis : 178 × 50 × 153 (mm)
Weight	1.9kg

CONTROLS & INDICATORS







Listed below are all the Controls and their indicators. Please see OPERATION Section for explanations.

① **BASS Control**
② **TREBLE Control (TREB)**
③ **ANTI THEFT LED**
④ **REPEAT ONE/ALL Indicator**
⑤ **PAUSE Indicator (ıı)**

⑥ **TAPE RUNNING Indicator (▸)**
⑦ **DIGITAL Display**
⑧ **DAT Slot**
⑨ **RESET Switch**
⑩ **MUSIC SENSOR DOWN Switch (⏮)**

⑪ **MUSIC SENSOR UP Switch (⏭)**
⑫ **SAMPLING FREQUENCY Indicators**
⑬ **PLAY/PAUSE Switch**
⑭ **MEMORY Switch (ME)**
⑮ **EJECT Switch**

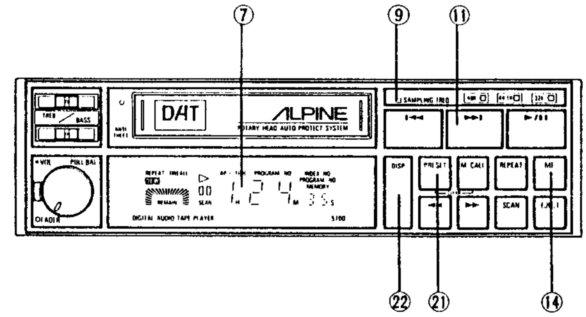
⑯ **REPEAT Switch**
⑰ **SCAN Switch**
⑱ **MEMORY CALL (M-CALL) Switch**
⑲ **FAST FORWARD Switch (▸▸)**
⑳ **FAST REWIND Switch (◂◂)**

㉑ **PRESET Switch**
㉒ **Display (DISP) Switch**
㉓ **PROGRAM NO./INDEX NO./PROGRAM NO. (Preset) Indicators**
㉔ **MEMORY Indicator**
㉕ **ELAPSED A/P-Time Indicators**

㉖ **SCAN Indicator**
㉗ **TAPE REMAIN Indicator**
㉘ **DEW Indicator**
㉙ **VOLUME Control/(Pull) BALANCE Control**
㉚ **FADER Control (FADER)**

㉛ **TUNER/LINE Switch**

OPERATION



BASIC OPERATION

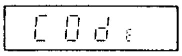
SYSTEM INITIATION

When operating for the very first time after installation or replacement of the car battery, press the RESET Switch ⑨ with a ball-point pen or other pointed object.

INITIAL CODE-IN PROCEDURES

After the initial installation, the following "Code-In" procedures must be followed before the unit will operate.

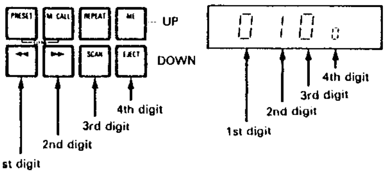
1. When the player is connected to the battery for the very first time and the ignition key is turned on, press the RESET switch ⑨ with a ball-point pen or similar tool. The indicator "CODE" will appear on the display ⑦.



Note: If the unit is disconnected from the battery and reconnected again, the unit will indicate "CODE" on the display and require the same code-in procedures.

2. Press the Music Sensor Up ⑪ switch to activate the Code entry mode. Four zeroes (0000) will appear on the display ⑦.

3. Using the 8 illuminated switches (⑭ to ㉑) enter the access code "0100." The display ⑦ shows "0100."



4. Press the DISP switch ㉒. Now the unit will function. The display will be activated as soon as a tape is inserted.

- **CHANGING THE CODE**

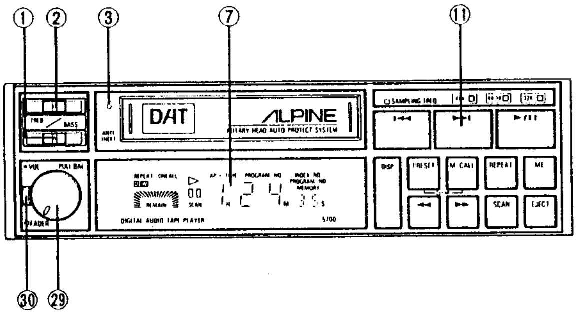
Once the unit has been powered up and its original code entered, the code can now be changed to any four digit code desired, as often as desired.

1. To initiate the code-out procedure, hold down the Music Sensor Up ⑪ switch for three seconds. The word "CODE" will appear in the display.
2. Press the Music Sensor Up ⑪ switch again, and four zeroes will appear in the display.
3. Enter the original factory code (or the previous code if it is already been changed), and press the DISP ㉒ switch.
4. "CODE" will reappear, flashing in the display. This indicates the unit is ready to accept a new code number.
5. Press the Music Sensor Up ⑪ switch and the four zeroes will appear again in the display.
6. Now enter your own personal four-digit code.
7. Press the DISP ㉒ switch again.
8. Your newly entered code will flash on the display momentarily, then "CODE" will appear again after about 3 seconds. This is for verification of the new code number.
9. Press the Music Sensor Up ⑪ switch again and re-enter your code number.
10. Press the DISP ㉒ switch again. Your code number is now fixed.

NOTE:

Each time the ignition is turned off, a red LED on the unit will flash continuously to warn passersby that the car is equipped with an anti-theft player. As a further theftdeterrent, a warning sticker and a remote blinking LED are also included. An Anti-Theft Identification Card is provided with the unit to record your personalized access code. Please keep this card in a safe place.

BASIC OPERATION



IMPORTANT NOTICE: The user is given three chances to input the correct access code "0100". If after three times he fails to enter the correct access code, an error signal "E" will appear on the display ⑦ and the unit will be inoperable for one hour. After an hour, "CODE" will appear and you may again enter the correct access code.

For the one hour waiting period, DO NOT DISCONNECT THE UNIT FROM THE CAR'S BATTERY.

ANTI THEFT LED③
This LED continuously flashes when the ignition switch is turned off.

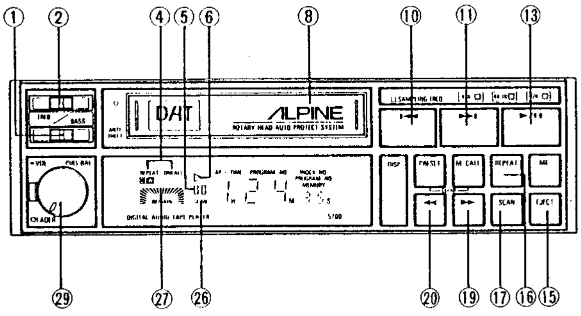
VOLUME CONTROL ㉙
Rotating the Volume Control ㉙ clockwise continuously increases the volume. Rotating the control counter-clockwise will continuously decrease the volume.

BALANCE CONTROL ㉙
Pull the Volume Control ㉙ and rotate to balance between the left and right speakers.

FADER CONTROL ㉚
Rotate the Fader Control ㉚ for your desired front to rear volume balance.

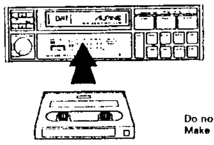
Separate BASS and TREBLE CONTROLS (①, ②)
Slide these controls to the right to increase, and to the left to decrease the level of Bass or Treble.

DAT OPERATION



PLAYBACK

1. Insert a DAT into the slot ⑧ with its tape window side facing up and the spine label facing out.



Do not insert a tape upside down.
Make sure that the tape facing up.

2. The player will automatically begin playback. The tape moves only one way with the TAPE RUNNING indicator ⑥ lighting up (no reverse playback).
3. Adjust the VOLUME ㉙, BASS ①, TREBLE ②, and BALANCE ㉙ controls to suit your listening preference.
4. When the DAT tape reaches the end, it will automatically rewind to the beginning, and the unit will then go into pause mode.
5. If the skip ID is recorded on the DAT and the player detects it, the player advances the DAT rapidly to the next start ID and begins playback from that point.
6. To discontinue the play back mode, push the EJECT ⑮ switch and remove the DAT or press the PLAY/PAUSE switch ⑬ to put the unit in the pause mode. The Pause Indicator ⑤ illuminates when the unit is set into the pause or stop mode.

- **PLAY/PAUSE ⑬**
  When the PLAY/PAUSE switch ⑬ is pressed while in the normal playback or memory playback mode, the player switches to the pause mode. To return to the normal playback or memory playback mode, press the PLAY/PAUSE switch again. If the unit remains in pause for over 5 minutes, the rotary head drum stops rotating and the tape-threading will be disengaged. In this case, the PAUSE indicator ⑤ remains illuminated.

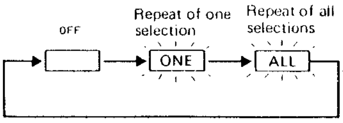
- **FAST FORWARD and REWIND**
  Press the FAST FORWARD (▸▸) switch ⑲ to rapidly advance the tape. Press the REWIND (◂◂) switch ⑳ until it locks to rapidly rewind the tape. Press the PLAY/PAUSE switch ⑬ to cancel fast winding, and the unit will resume playback mode.

- **MUSIC SENSOR Switch**
  Press the MUSIC SENSOR switch (▸▸|) ⑪ to skip to the beginning of the next program; (|◂◂) ⑩ to rewind the tape to the beginning of the current program being played. This functions in both playback and pause modes.

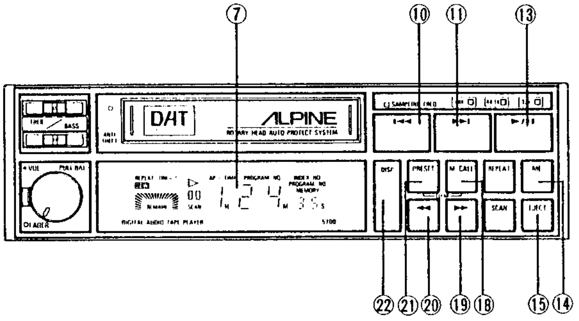
- **SCAN**
  Press the SCAN switch ⑰ and the first 10 seconds of each program will be played. Pressing the switch again within 10 seconds advances the tape to the next program. SCAN indicator illuminates and the program No. indicator will blink during scan mode. To return to the normal playback mode, press the PLAY/PAUSE ⑬ switch

- **REPEAT**
  One pressing on the REPEAT Switch ⑯ selects "repeat one", second press selects "repeat all", and a third press deactivates function.

- **REPEAT ONE/ALL Indicator ④**
  The indicator "ONE" appears on the display when the player is repeatedly playing one section between the start IDs, and "ALL" appears when the unit is repeatedly playing all the programs recorded on the DAT.



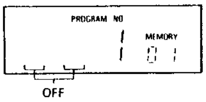
DAT OPERATION


⑦
⑩
⑪
⑬
DAT
ALPINE
ROTARY HEAD AUTO PROTECT SYSTEM
DISP
PRESET
M CALL
REPEAT
ME
SCAN
EJECT
DIGITAL AUDIO TAPE PLAYER
5700
㉒
㉑
⑳
⑲
⑱
⑮
⑭

● SETTING PROGRAMS IN MEMORY

1. To preset programs, press ME (Memory) switch ⑭ to set the player into the Memory mode.
   Note: The Memory mode can only be activated from Play and Pause modes.

2. The display ⑦ indicates as shown below.


PROGRAM NO
MEMORY
OFF

Complete the following procedures 3 and 4 within 5 seconds.

3. Press the MUSIC SENSOR switch (⑩ or ⑪) and select desired program number to be preset. Pressing the switch each time advances the program number by one. If the switch is pressed continuously for over 2 seconds, the program number advances consecutively at a speed of 3 program numbers per second.
4. When the desired program number is selected, press the PRESET switch ㉑. The program number is now set in memory.

5. Repeat the above procedures to preset other programs up to 24.

   ○ You can store a total of 24 programs in memory. If you attempt to memorize 25 or more programs, the indicator on the display ⑦ flashes to tell you that no more program can be set.

   ○ When a new program is set according to the procedures above, the previous program on that memory will be erased.

● CLEARING PRESET MEMORY

To clear the preset programs, press the PRESET switch ㉑ and M-CALL switch ⑱ simultaneously.

● PRESET PLAYBACK

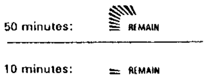
After pressing the M-CALL switch ⑱, press the PLAY/PAUSE switch ⑬, and the unit will change to the preset playback mode. The programs that have been preset into memory will then play back in order. If no programs have been preset, the unit will remain in normal playback mode. If a program number has been preset which is out of the range of the current tape's programs, that preset will be skipped during preset play. If the unit detects a skip ID, it will skip to the next memorized program.
After all preset programs have been played back, the unit will return to normal playback mode and go into pause.
If you press either the EJECT switch ⑮, the FAST FORWARD ⑲, or REWIND ⑳ switch, the preset playback mode will be cancelled.

● MEMORY CALL (M-CALL) Switch ⑱

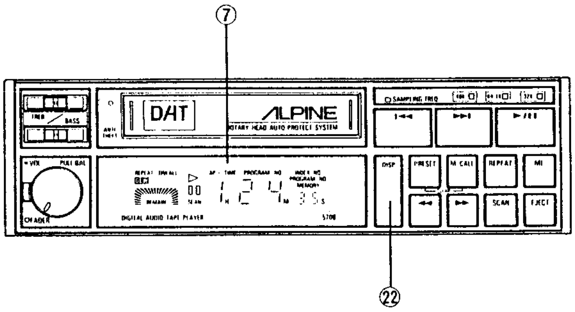
Press the MEMORY CALL switch ⑱ in the preset playback mode for selecting your desired program. Then press the PLAY/PAUSE switch ⑬, the unit will play from the selected program.

● Tape REMAINING Indicator ㉗

Indicates the relative amount of the tape remaining. The number of bars decreases from the right to left (one bar each 5 minutes) as shown below.


50 minutes:
REMAIN
10 minutes:
REMAIN

DAT OPERATION


⑦
DAT
ALPINE
ROTARY HEAD AUTO PROTECT SYSTEM
DISP
PRESET
M CALL
REPEAT
ME
SCAN
EJECT
DIGITAL AUDIO TAPE PLAYER
5700
㉒

● DISPLAY (DISP) Switch ㉒

Press this switch to change the 5 modes as described in the section "DISPLAY MODES".

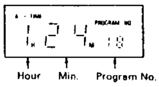
● DISPLAY MODES

There are 5 standard modes and 1 special mode as described below.

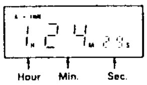
A-TIME means the elapsed time from the beginning of the digital audio tape and P-TIME means the elapsed time for the current program being played.

Note: Some D.A.T. Decks cannot record A-TIME on a tape. The 5700 does not show A-TIME on the display ⑦ of the tape recorded by such D.A.T. Decks.

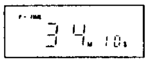
-Mode 1: Displays A-TIME and PROGRAM NO. as shown in the following example.


A-TIME
PROGRAM NO
Hour
Min.
Program No.

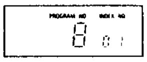
-Mode 2: Displays only A-TIME.


A-TIME
Hour
Min.
Sec.

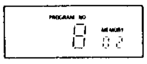
-Mode 3: Displays P-TIME and it will be cleared when the tape reaches next start ID.



-Mode 4: Displays PROGRAM NO. and INDEX NO.

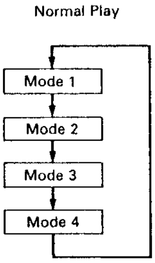

PROGRAM NO
INDEX NO

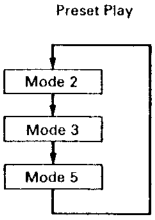
-Mode 5: Displays PROGRAM NO. and MEMORY NO.


PROGRAM NO
MEMORY

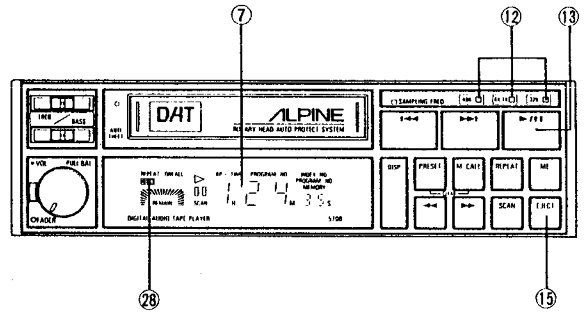
-Special Mode: Displays Anti-Theft "CODE" and ACCESS CODE NO.

The displays change in the following sequence when the DISP switch ㉒ is depressed.


Normal Play
Mode 1
Mode 2
Mode 3
Mode 4


Preset Play
Mode 2
Mode 3
Mode 5

DAT OPERATION


⑦
⑫
⑬
DAT
ALPINE
㉘
⑮

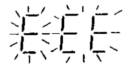
SAMPLING FREQUENCY Indicators ⑫
The player automatically detects and switches to the correct sampling frequency used in recording on the DAT, and indicates that frequency.

32kHz:	Lights when playing back the DAT recorded in the 32kHz (16 bits) mode.
44.1kHz:	Illuminates when playing back a commercially pre-recorded DAT in the 44.1kHz (16 bits) mode.
48kHz:	Comes on when playing back a DAT recorded by a regular DAT recorder in the 48kHz (16 bits) mode.

DEW Indicator ㉘
Comes on when moisture condensation is produced inside the unit.

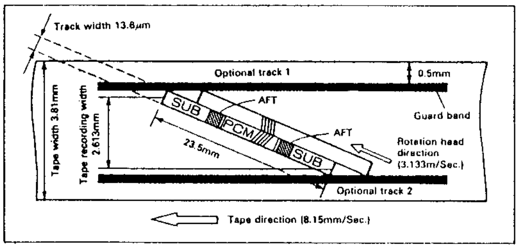
EEE INDICATOR

When the "EEE" indicator on the display ⑦ comes on and flashes, check to see if the tape loading was performed without a DAT inserted in the slot. If this is the case, **press the EJECT switch.**



If you are certain that a DAT was inserted and loaded properly, press the PLAY/PAUSE switch ⑬ and set the unit into the play mode. If the indicator ⑦ still remains flashing, **never** press the EJECT switch ⑮ as the DAT may receive irreparable damage; take the unit to the nearest service station for servicing.

DAT METHOD
The recording track is positioned on a slant on DAT as shown in the figure.
The track is devided into three parts.


Track width 13.6μm
Optional track 1
0.5mm
AFT
Guard band
Tape width 3.81mm
Tape recording width 2.613mm
SUB
PCM
SUB
AFT
23.5mm
Rotation head direction (3.133m/Sec.)
Optional track 2
Tape direction (8.15mm/Sec.)

PCM (Pulse Code) Area:
Pulse Code of modulated sound signal is recorded on.

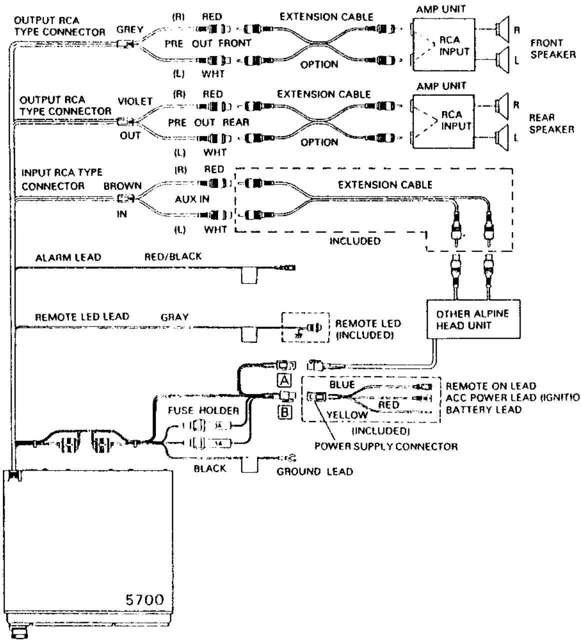
ATF (Auto Track Finding) Code Area:
Code for ATF function is recorded on.

SUB Code Area:
Several kinds of code are recorded on for convenient play functions with the 5700.

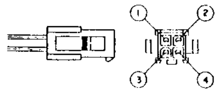
- Start ID Code
  Denotes the beginning of a track for Music Search, skip functions etc.
- Skip ID Code
  Locates at the end of a music for Auto skip functions.
- Program Number Code
  Shows serial number of a music.
- Index Number Code
  Shows serial number of a music part of one music which contains several parts such as movements of a symphony etc.
- Absolute Time Code
  Denotes the elapsed time from the beginning of a D.A.T.
- Program Time Code
  The each elapsed time from the beginning of a music.
- TOC
  Shows content of recorded musics.

So Sub code area capacity of DAT is 4.6 times of compact disc, it will be applied to development of DAT function.

CONNECTIONS

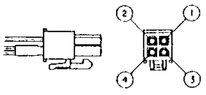

OUTPUT RCA TYPE CONNECTOR
GREY
(R) RED
PRE OUT FRONT
(L) WHT
EXTENSION CABLE
OPTION
AMP UNIT
RCA INPUT
R
L
FRONT SPEAKER
OUTPUT RCA TYPE CONNECTOR
VIOLET
(R) RED
PRE OUT REAR
OUT
(L) WHT
EXTENSION CABLE
OPTION
AMP UNIT
RCA INPUT
R
L
REAR SPEAKER
INPUT RCA TYPE CONNECTOR
BROWN
(R) RED
AUX IN
IN
(L) WHT
EXTENSION CABLE
INCLUDED
ALARM LEAD
RED/BLACK
REMOTE LED LEAD
GRAY
REMOTE LED (INCLUDED)
OTHER ALPINE HEAD UNIT
A
B
BLUE
RED
YELLOW
REMOTE ON LEAD
ACC POWER LEAD (IGNITION)
BATTERY LEAD
(INCLUDED)
FUSE HOLDER
POWER SUPPLY CONNECTOR
BLACK
GROUND LEAD
5700

[A] AUX. POWER CONNECTOR



①	IN REMOTE
②	OUT PAUSE
③	BATTERY
④	IGNITION

[B] MAIN POWER CONNECTOR



①	REMOTE ON
②	IN PAUSE
③	BATTERY
④	IGNITION

This unit is designed for 12-volt DC negative ground operation. Check to be sure that your vehicle has this type of system before connecting the power cables.

- **OUTPUT RCA TYPE Connectors**
  RCA type connectors are for connecting to other Amp. unit etc. having RCA type input connector.
- **INPUT RCA TYPE Connectors**
  RCA type connectors are for connecting to other head unit etc. having RCA type output connector.
- **ALARM Lead**
  The alarm lead is for connection with Alpine 8007/8008 Alarm System (optional) that can be interfaced with your Alpine head unit.
- **REMOTE LED (INCLUDED)/REMOTE LED Lead**
  Use a connection fitting for the remote LED lead and connect the included remote LED. When the ignition-key is off, the LED flashes continuously to indicate that this player is equipped with an anti-theft system.
- **GROUND Lead**
  This lead should be securely connected to a metal chassis of the vehicle.
- **REMOTE ON Lead**
  If the unit is connected to your Amp unit with RCA jacks, connect the remote ON lead to the male connector of your Amp unit remote ON lead.
- **ACC POWER Lead (Ignition)**
  This lead is for connection to the ignition switch (ACC terminal) in the vehicle's fuse box. Do not connect this cable directly to the positive (+) terminal of the battery as this unit draws a fair amount of current and the battery power may be depleted.
- **BATTERY Lead**
  Connect this lead to the positive (+) terminal of the battery or another circuit that constantly supplies +12V power.

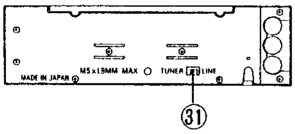
  Note: If the battery power cable of the player is disconnected from the positive (+) terminal of the battery, the memory of programs will be erased. So keep the battery power cable always connected to the battery.

㉛ LINE/TUNER Switch

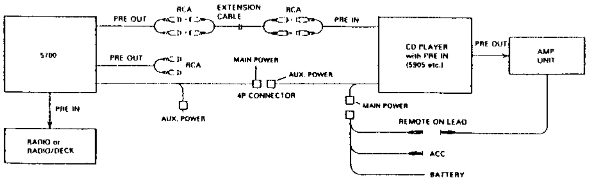
a) Set the switch to the LINE position when a CD player is connected to the PRE-IN connector of this unit.
(Sound level of the CD player must be controlled by the volume control on the CD player.)

b) Set the switch to the LINE position when a head unit is connected to the unit.
(Sound level of the head unit can be adjusted by the volume control on the head unit.)

c) Place the switch to the TUNER position when a tuner is connected to the unit.
(Volume level can be adjusted by the volume control of the unit.)



NOTE:
Please make connection as shown below, if this unit is connected to a CD player with a Pre-in connector (5905, etc.).



If combined with an Alpine cassette radio with an independent Tuner Mode Select Switch, any playback mode can be selected simply by pressing the desired function switch on any unit; ie. CD, cassette or tuner, etc.

If combined with an Alpine cassette radio that does not have an independent Tuner Mode Select Switch, the 5700 goes into pause mode after AUTO REWIND or FAST FORWARD or REWIND functions are completed. To initiate DAT operation, you must press the PLAY/PAUSE switch again.

If you want to switch to the cassette or radio mode from the pause mode, you simply press the PLAY/PAUSE switch twice. The unit will then return to the mode in operation before DAT play began (ie. radio, cassette or CD).

PRECAUTIONS

1) When replacing the fuse(s), the replacement must be of the same amperage (3A) as shown on the fuse holder. If the fuse(s) blows more than once, carefully check all electrical connections for shorted circuitry. Have your car's voltage regulator checked also. Do not attempt to repair the unit yourself; return the unit to your Alpine dealer or the nearest Alpine Service station for servicing.

2) In order to ensure proper performance, be sure the temperature in your car is within the range of 14 degrees F (-10 degrees C) to 140 degrees F (60 degrees C) before turning your player on. Good air circulation is essential, especially in hot weather, to prevent internal heat build-up in the unit.

3) Prevent any foreign objects from entering the slot opening as the precision mechanism and tape head may be damaged.

4) To protect your digital audio tapes, store them in a cool place away from dust, dirt, and strong magnet sources such as electric motors and speakers.

5) Check and make sure any slack in the tape is taken up before inserting the DAT into the player. A loose tape could cause damage to the player and the DAT itself. Tighten the DAT by inserting a pencil or a similar instrument into the spindle hole and turn until all the slack has been taken up.

6) This player has been lubricated at the factory. Additional lubrication is not required.

HEAD CLEANING

When playback sound begins to deteriorate, it is time to clean the playback head. Insert a special head cleaning tape into the tape-loading slot and allow it to run for a few minutes to remove any foreign matter.

Notes:

1. During loading the head cleaning tape;
   Do not set the player in FF or REW mode.
   Do not leave the cleaning tape in the player with the mode set to pause.
2. The player may eject the damaged head cleaning tape.

Disassembly Instructions

<DISASSEMBLY OF DAT CASSETTE DECK ASSEMBLY AND P. C. BOARDS>

1. Removal of DAT Cassette Deck

(1) After removal of the top cover, the bottom cover and the nosepiece, remove two screws marked "△" as shown in Figure 1.

(2) Remove all wires from DAT Cassette Deck.

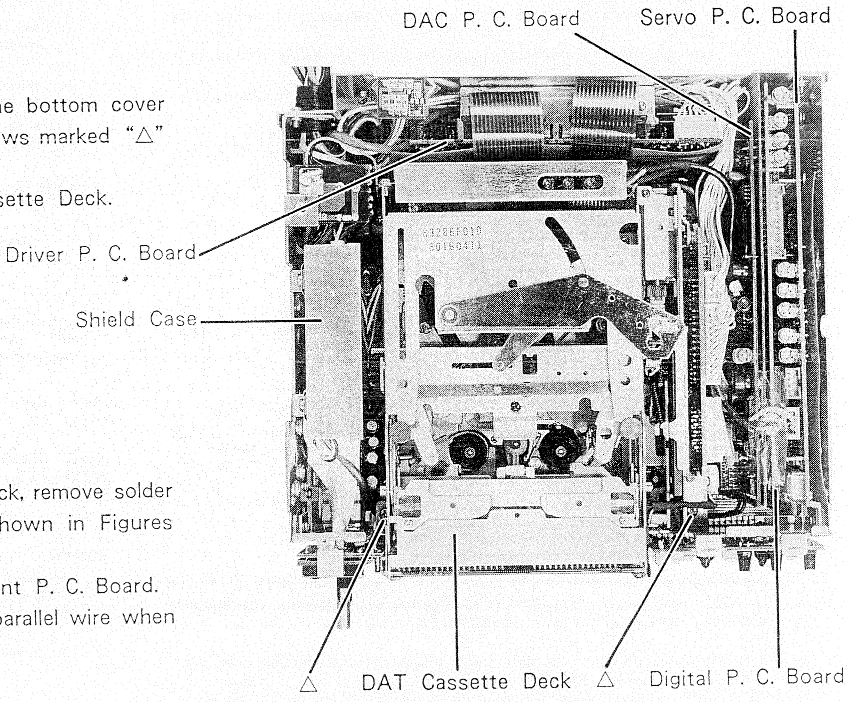

DAC P. C. Board
Servo P. C. Board
Driver P. C. Board
Shield Case
△
DAT Cassette Deck
△
Digital P. C. Board

Figure 1

2. Removal of Front P. C. Board

(1) After removal of DAT Cassette Deck, remove solder (a) and two screws "×" as shown in Figures 2 and 3.

(2) Remove one connector from Front P. C. Board.

NOTE :Take care not to cut the parallel wire when unsoldering (a).

3. Removal of DAC, Digital, Servo and Driver P. C. Boards

(1) By removing solders (b) and (c) as shown in Figure 3, these P. C. Boards can be removed from Main P. C. Board.

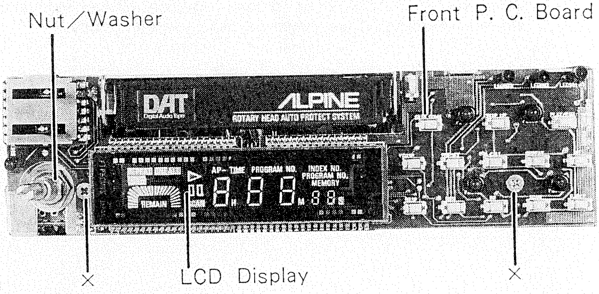

Nut/Washer
Front P. C. Board
DAT
ALPINE
ROTARY HEAD AUTO PROTECT SYSTEM
×
LCD Display
×

Figure 2

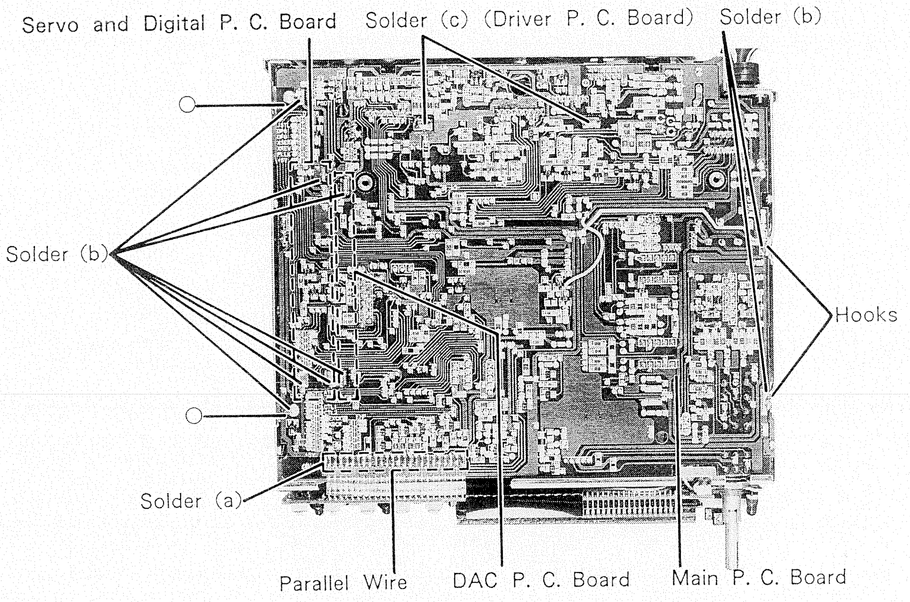

Servo and Digital P. C. Board
Solder (c) (Driver P. C. Board)
Solder (b)
○
Solder (b)
Hooks
○
Solder (a)
Parallel Wire
DAC P. C. Board
Main P. C. Board

Figure 3

4. Removal of D/D Converter P. C. Board

(1) By removing two screws marked "※" and solder (d), remove the shield case as shown in Figures 4 and 5.

(2) Remove solder (e) and three hooks as shown in Figure 5.

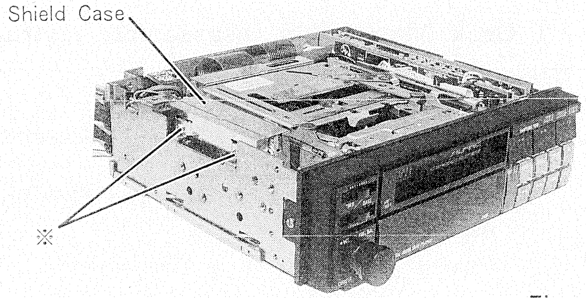


Figure 4

5. Removal of Main P. C. Board

(1) After removal of Front P. C. Board, remove solders (b) and (c), two hooks and two screws marked "○" as shown in Figure 3.

(2) Remove one nut and washer as shown in Figure 2 and all wire leads from Main P. C. Board.

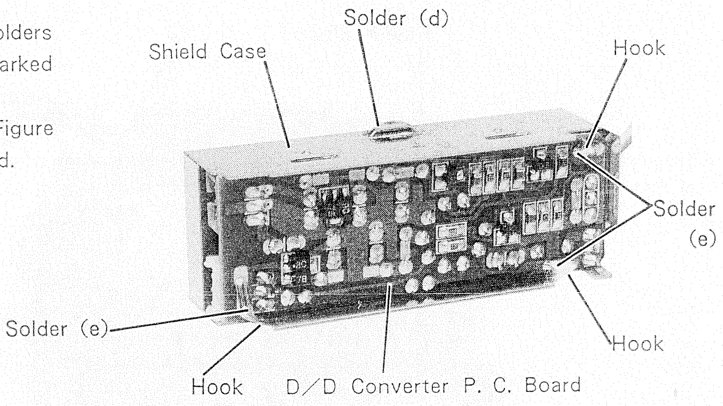


Figure 5

<DISASSEMBLY OF DAT CASSETTE DECK MECHANISM>

I Notes on Handling

1. Mechanism Part

(1) Lightly grasp the holder part of the deck mechanism when holding the mechanism.

(2) Do not touch the drum of the drum motor assembly with the hand. Do not pull the dew sensor, the heater and RF wire also.

(3) When placing the mechanism, take care not to give hard shocks to it.

(4) Do not touch the flexible ribbon wire tip, pull strongly nor twist the wire also.

(5) Do not lift the mechanism by the flexible wire nor any wire.

(6) Do not touch the roller of the guide roller nor damage it with the nail.

(7) Do not touch nor damage any post surface where the tape threads on.

(8) Do not give contaminations nor damage to the plate spring for cassette tape pack hold of the holder part.

(9) Do not touch pinch rollers, belt rubber nor pulleys which belts thread with the oiled or glistened hand.

2. Drum Motor Assembly Part

(1) Do not touch the drum of the drum motor assembly nor the dew sensor surface.

(2) When holding the assembly, grasp both sides of the drum motor base.

(3) When placing the assembly, place it on something soft and do not place it around metalic materials, screws and so on.

(4) Do not lift the assembly by the flexible wire and do not touch the plated flexible wire tip.

(5) Omit soldering works nearby the drum motor assembly.

(6) Do not give any external power to the drum part.

3. Capstan Motor Part

(1) Do not cause something metalic or magnetized to touch nor come around.

(2) Do not touch FG sensor.

(3) Do not lift the motor by the flexible ribbon wire.

(4) Do not damage the rubber magnet.

Ⅱ Deck Mechanism Disassembly Instructions

1. Removal of Holder Block

(1) Remove six screws marked "○" and one spring (A) as shown in Figures 6 and 7.

(2) Remove each connector from two END Sensor Assemblies.

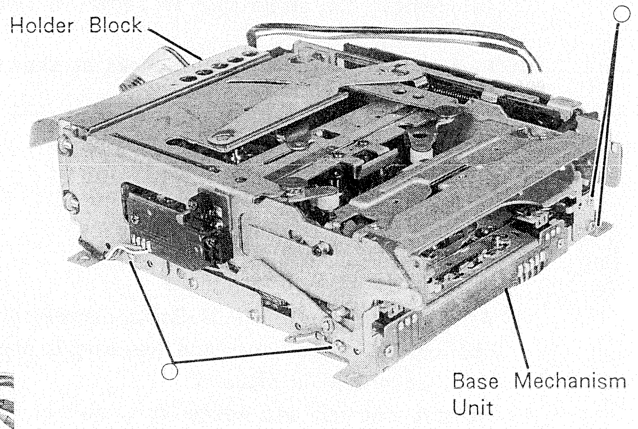

Holder Block
○
○
Base Mechanism Unit

Figure 6

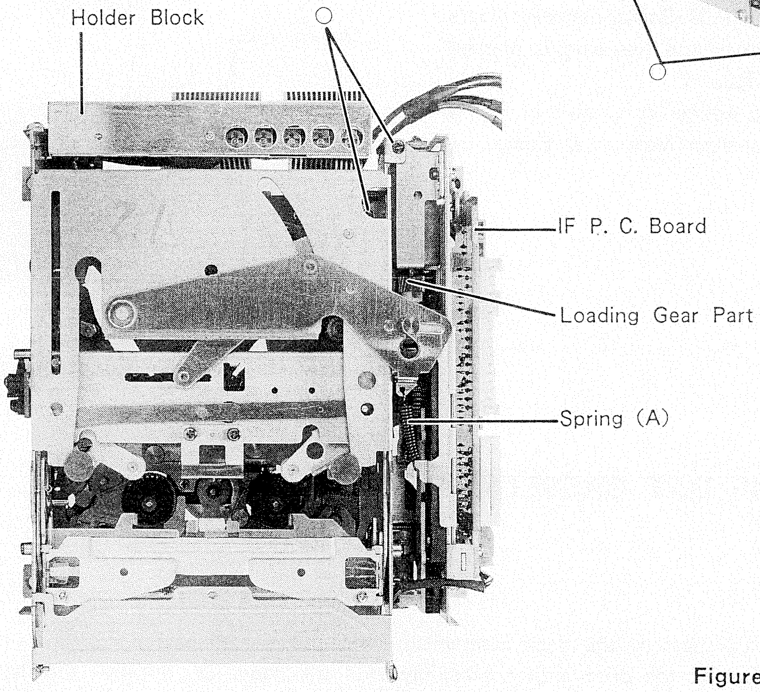

Holder Block
○
IF P. C. Board
Loading Gear Part
Spring (A)

Figure 7

2. Removal of Loading Gear Part

(1) After removal of Holder Block, remove three screws marked "□" as shown in Figure 8 and all wire leads from IF P. C. Board.

(2) Loading Gear Part can be removed completely with IF P. C. Board, Loading Motor and Load Mode Sensor P. C. Board (1).

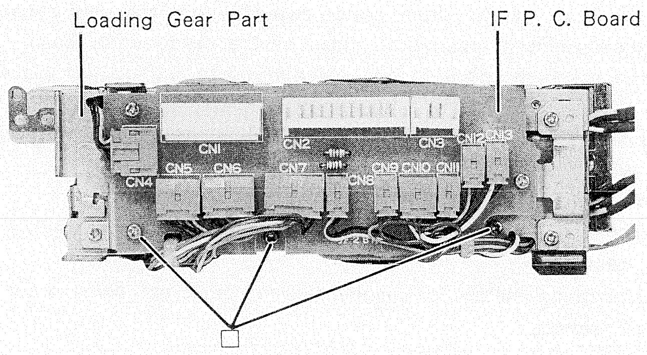

Loading Gear Part
IF P. C. Board
CN1
CN2
CN3
CN12
CN13
CN4
CN5
CN6
CN7
CN8
CN9
CN10
CN11
□

Figure 8

3. Removal of Sub-Chassis Block

(1) Remove the belt (A) and four screws marked "△" as shown in Figures 9 and 10.

4. Removal of Drum Motor and Capstan Motor

(1) Remove three screws marked "●" and three screws "■" as shown in Figure 10.

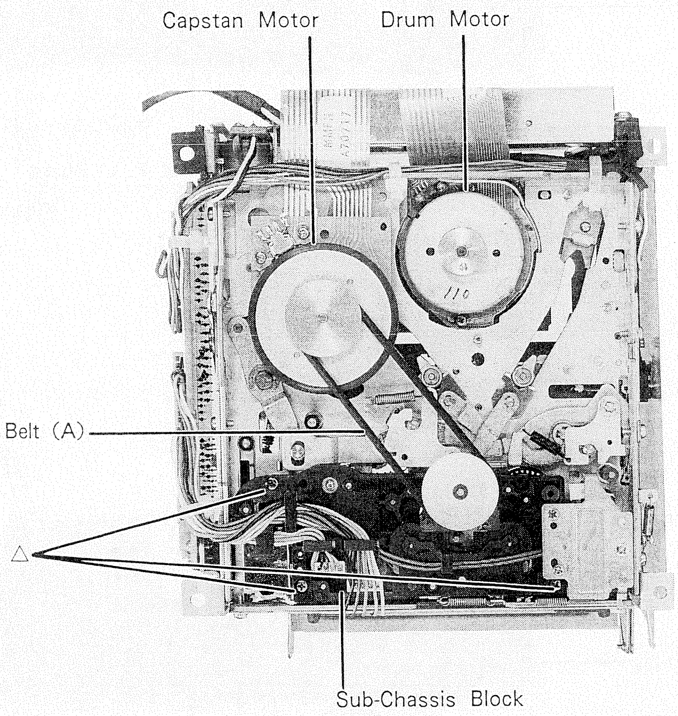

Capstan Motor
Drum Motor
Belt (A)
△
Sub-Chassis Block

Figure 9

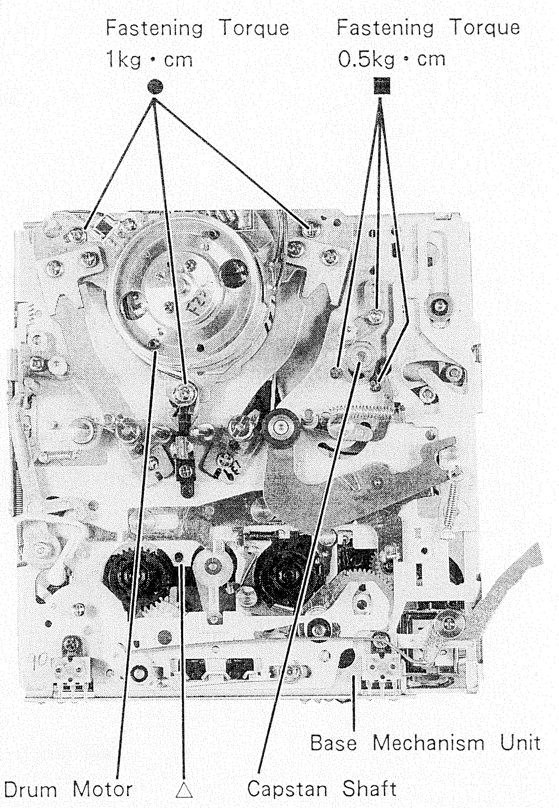

Fastening Torque
1kg・cm
●
Fastening Torque
0.5kg・cm
■
Base Mechanism Unit
Drum Motor
△
Capstan Shaft

Figure 10

5. Removal of Loading Motor and Load Mode Switch

(1) Remove two screws marked "☆" as shown in Figure 11.

(2) By removing one "E" ring and two screws marked "★", and Loading Motor can be removed as shown in Figure 12.

(3) Remove two screws marked "▲", and Load Mode Switch can be removed as shown in Figure 11.

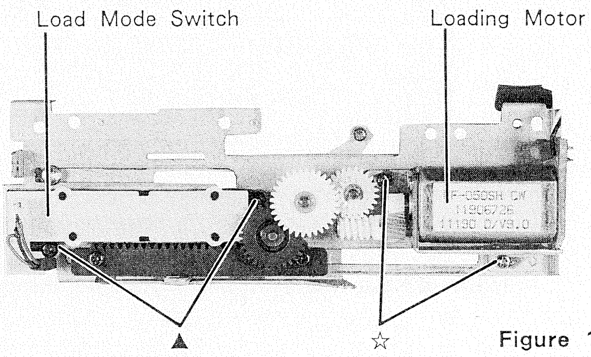

Load Mode Switch
Loading Motor
▲
☆

Figure 11

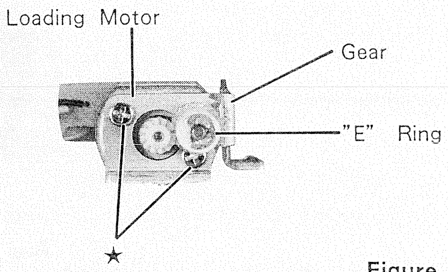

Loading Motor
Gear
"E" Ring
★

Figure 12

6. Removal of Reel P. C. Board

(1) Remove two washers (B), two Reel Bases as shown in Figure 13 and three screws "◎" as shown in Figure 15.

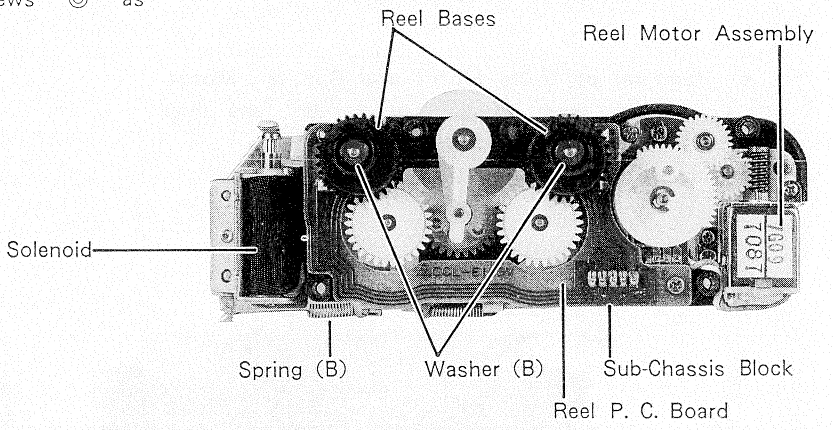

Reel Bases
Reel Motor Assembly
Solenoid
Spring (B)
Washer (B)
Sub-Chassis Block
Reel P. C. Board

Figure 13

7 . Removal of Solenoid

(1) Remove two screws "※" and one spring (B) as shown in Figures 13 and 14.

(2) Remove two blue wires from the solenoid.

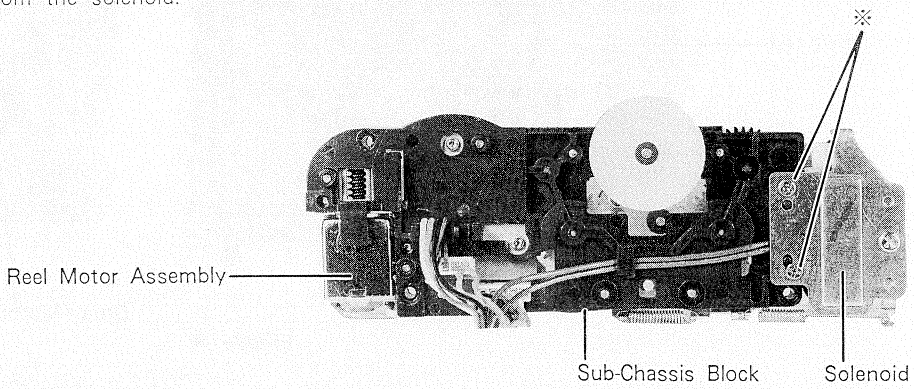

※
Reel Motor Assembly
Sub-Chassis Block
Solenoid

Figure 14

8. Removal of Reel Motor Assembly

(1) After removal of Reel P. C. Board, remove three screws marked "×" as shown in Figure 15.

(2) Remove two wires, red and white, from the motor.

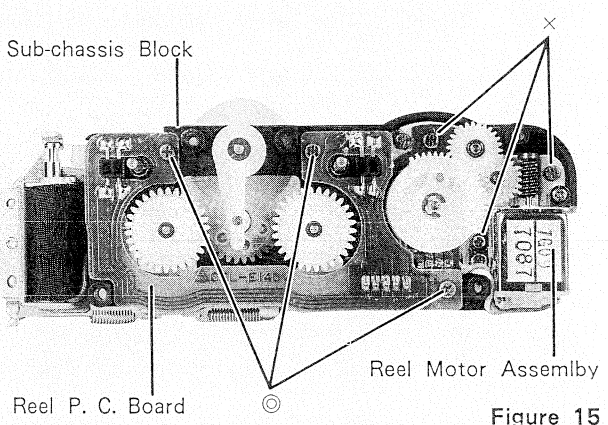

×
Sub-chassis Block
Reel P. C. Board
◎
Reel Motor Assemlby

Figure 15

Descriptions on DAT Cassette Deck Mechanism Operations

Descriptions on the mechanism

The deck mechanism parts of this model include three functional assemblies of the tape loading mechanism, tape running post system reel base drive and cassette tape pack hold/eject mechanism.

1. Tape Loading Mechanism

Soon after a cassette tape pack is loaded, Loading motor is driven for two IC bases (R) / (L) and pinch roller sliding in the arrow directions as shown in Figure 16 so as to take up and thread the tape onto the drum of the drum motor.

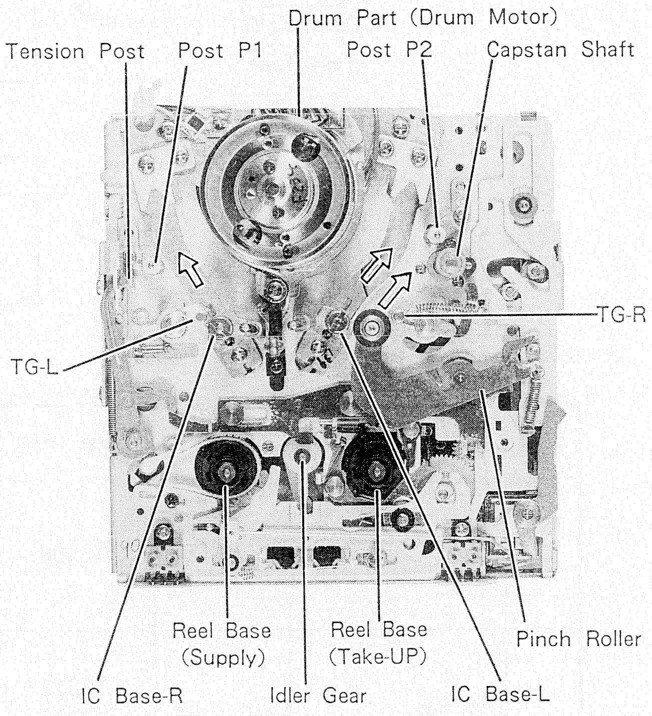

Drum Part (Drum Motor)
Tension Post
Post P1
Post P2
Capstan Shaft
TG-R
TG-L
Reel Base (Supply)
Reel Base (Take-UP)
Pinch Roller
IC Base-R
Idler Gear
IC Base-L

Figure 16

2. Reel Base Drive Function of Tape Running Post System

(1) Tape Running Post System

Tape running post system include eight posts (TG-L/R, Post P1/P2, IC Base-L/R, Slant Post-L/R), the drum motor and the capstan as shown in Figure 17. The tape can run firmly led by the capstan motor in the parlicular speed and thread along each post.

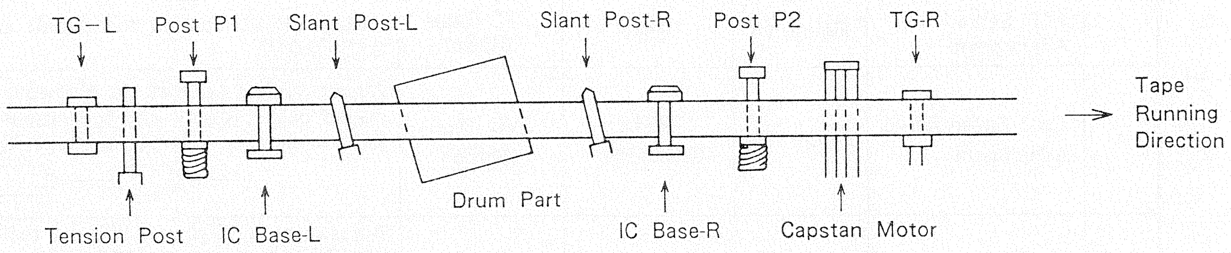

TG−L
Post P1
Slant Post-L
Slant Post-R
Post P2
TG-R
Tape Running Direction
Tension Post
IC Base-L
Drum Part
IC Base-R
Capstan Motor

Figure 17

(2) Reel Base Drive Mechanism

Reel Base rotations are all driven by each belt from the capstan motor. Reel motor drives in PLAY and FF modes for swinging the idler gear to rightward and the take-up reel base drives. In REW mode, the idler gear swings leftward and the supply reel base drives.

3. Cassette Tape Pack hold/eject mechanism

Cassette Holder drives the DAT cassette tape pack horizontally when loading and vertically when unloading and performs OPEN/CLOSE of the slot lid.

Holizontal slide : OPEN/CLOSE of Cassette Tape Pack Slider
Vertical slide : OPEN/CLOSE of Slot Lid

Adjustment Procedures

1. Connections

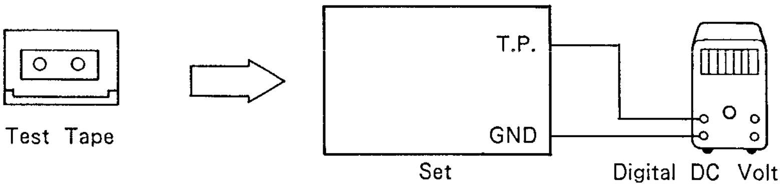


Figure 18

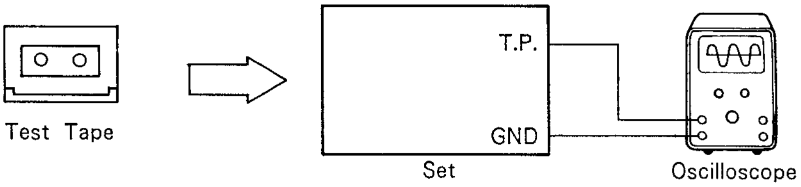
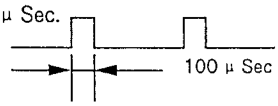
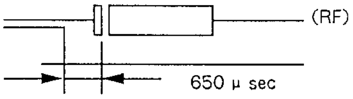
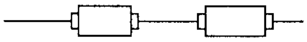
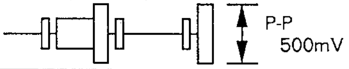
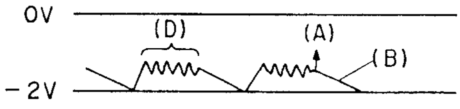
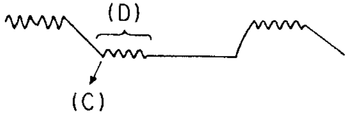


Figure 19

2. Adjustment Procedures

Step	Description	Connection	Test Point	Test Tape	Adjustment
1	D. BIAS Adjustment	Figure 19	TP508	Blank Tape	Adjust VR506 so that the BIAS PWM waveform indicates 100 μ Sec. 
2	DLYPG Adjustment	Figure 19	TP513 TP505 (GND, RF)	TY-7251	Adjust VR503 so that time from DLYPG to SUB1 start becomes 650±10 μ Sec. 
3	ATF Servo Adjustment	Figure 18	TP510	JVC Tape (Music)	Adjust VR501 so that the output is 2.85±0.01V.
4	Tape Speed Servo Adjustment	Figure 19	TP513 (GND, RF)	JVC Tape (Music)	Adjust VR502 so that the RF waveform is played back properly and the output is firmly maximum. (at power supply DC 11.0V) 
5	PILOT Adjustment	Figure 19	TP512 (GND, RF)	TY-7111	Adjustment VR504 and 505 so that each PILOT playback level is 500±30mV at A and B channels respectively. 
6	PLL Adjustment	Figure 19	TP6101	TY-7551	 ①Adjust VR6102 so that (B) voltage is quite even. ②Adjust L6101 so that (A) is −1.5V and PLL is locked. ③Adjust VR6101 so that (D) is quite even.
7	PLL FF/REW Adjustment				 ①Adjust VR6103 so that (C) voltage is approx. 0.2V lower than (D) voltage in FF (REW) mode. ②Adjust VR6101 so that PLL is fixed in FF (REW) mode.

2-1 Back Tension Torque Adjustment

Adjustment Procedures	Remarks
1. Once loosen and then fasten slightly the screw (Set Screw) which fixes the guide roller.	Make sure that the guide roller is driven in slight resistances. (See Figure 20)
2. Adjust the posts P1 and P2 to their lower limit and the guide rollers L/R to their upper limit with the height adjustment jig.	Use the height adjustment jig, the hexagonal socket lench and the double socket lenches. (See Figure 21)
3. By swinging adjust the cam A right and left so that the tension post is located at the position as shown in Figure 22 in PLAY mode and fix the cam with screw.	(See Figure 22)
4. Employing the torque measuring tape TW7111 from SONY, adjust with the pressed products tightening and loosening spring so that the back tension torque is 6.5 to 8.5g • cm at center in REC/PLAY mode.	(See Figures 23 and 24)
5. Fix the pressed products B with the screw.	(See Figure 23)
6. When the back tension torque can not be obtained in STEP 4 adjustment properly, first swing the cam A right and left and then repeat the adjustment STEP 4.	In this status, the tape must be engaged with all of the P1 post, tension post and TG-L/R.
7. Fasten the cam A and the pressed product B with screws.	

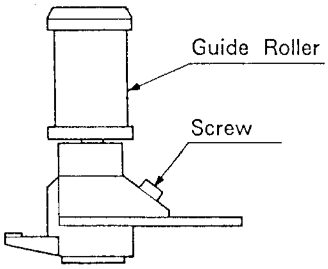

Guide Roller
Screw

Figure 20

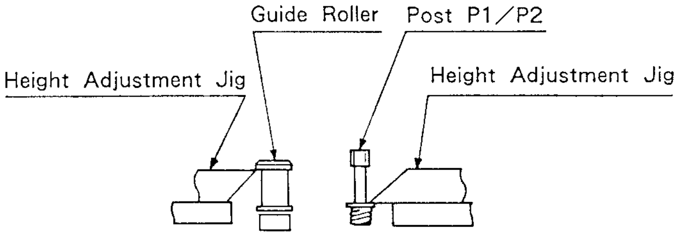

Guide Roller
Post P1/P2
Height Adjustment Jig
Height Adjustment Jig

Figure 21

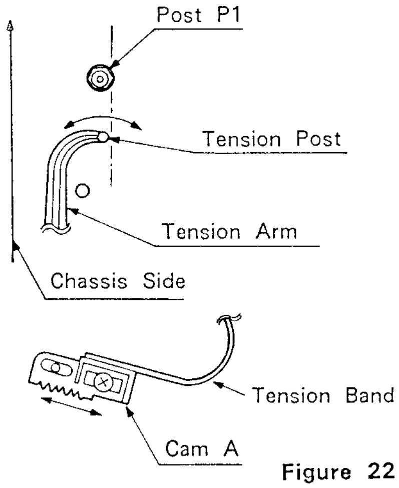

Post P1
Tension Post
Tension Arm
Chassis Side
Tension Band
Cam A

Figure 22

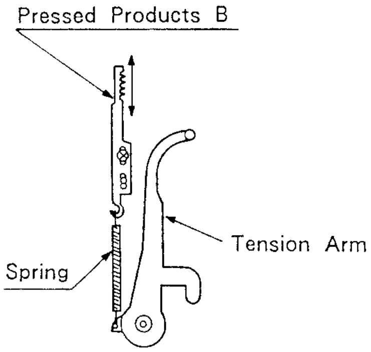

Pressed Products B
Tension Arm
Spring

Figure 23

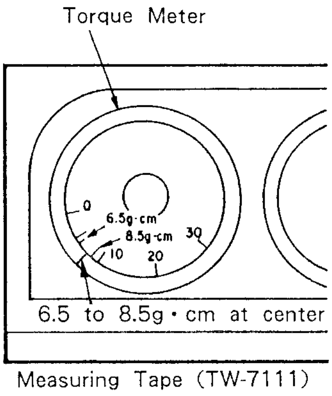
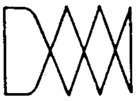
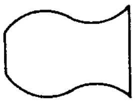
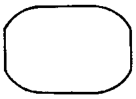
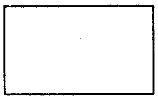
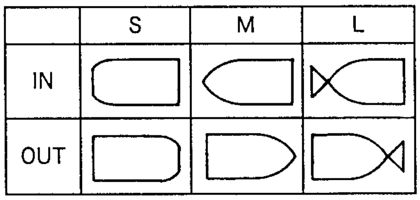
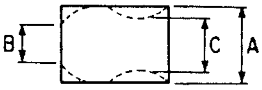

Torque Meter
0
6.5g·cm
8.5g·cm
30
10
20
6.5 to 8.5g • cm at center
Measuring Tape (TW-7111)

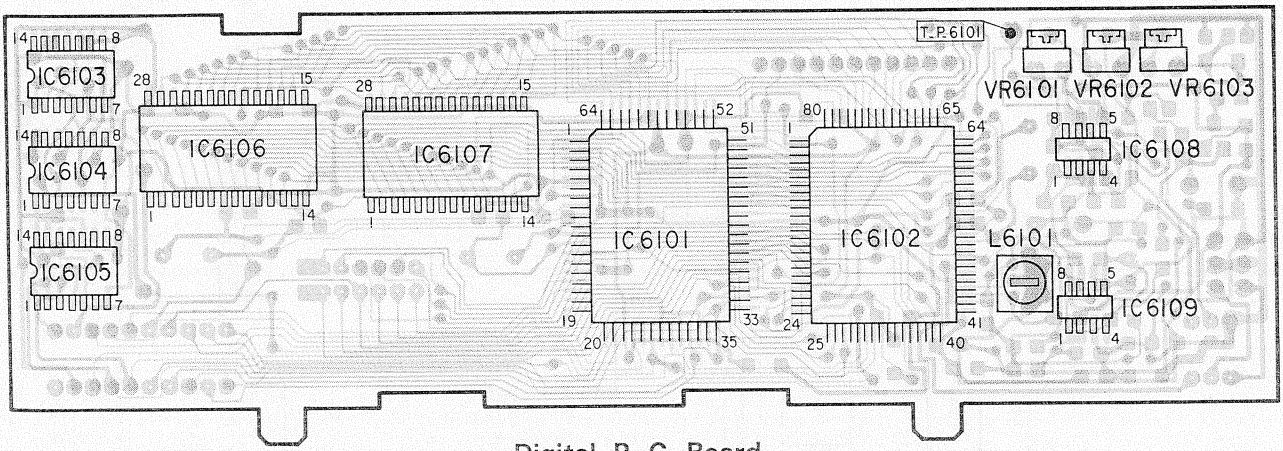
Figure 24

2−2 Tape Running Adjustment

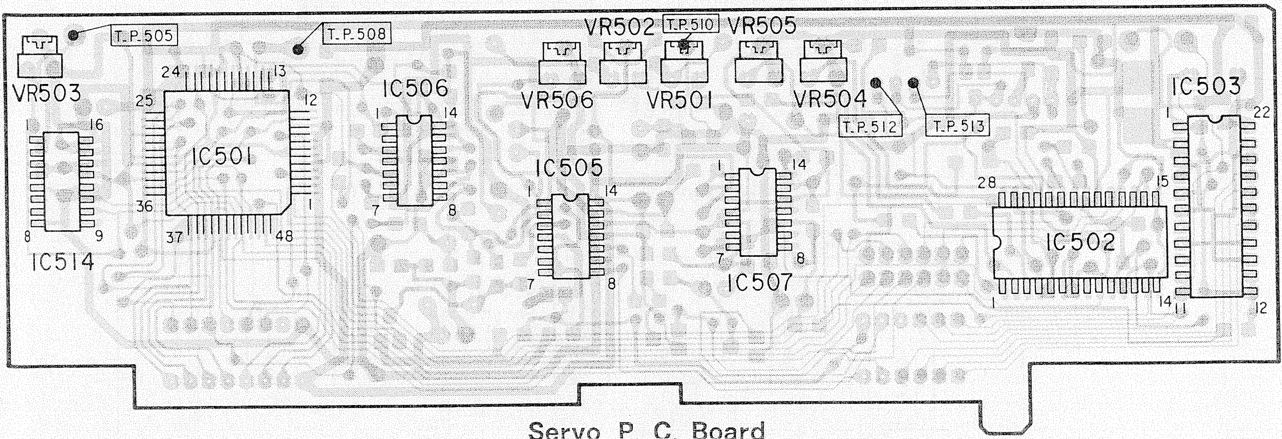
Wipe each running post using the cotton pad with daiphrone.

Adjustment procedures	Remarks
1. Load the running adjustment tape TY7251 and set the mode into PLAY.	
2. Release the tape from the under limit guide by rotating clockwise the top hexagonal socket with the hexagonal lench.	
3. Adjust the guide roller seeing the FR signal envelope on the oscilloscope.	
4. Adjust the guide roller on the take-up side by rotating with the double socket lench so that the envelope on the take-up side shows parallel for some period.	
5. Rotate the guide roller on the supply side clockwise or counterclockwise so that the oscilloscope omit the envelope cross track completely.	
6. Rotate each side guide roller slightly clockwise so that the tape comes to the lead of the cylinder.	
7. The adjustment can be checked by indicating the envelope waveform on the both side as shown in Figure.	
8. Rotate each sid guide roller counterclockwise slightly clockwise so that the envelope shows the waveform as shown in Figure.	
9. When the tape is running out of the lead, the envelope shows waveforms as shown in Figure.	
10. Fasten screws for the guide rollers with the hexagonal lench in 1kg • cm of ontorque.	(See Figure 20)
11. Perform Eject and Loading once and make sure that the envelope show the waveform as shown in Figure. If not, repeat the adjustments from the step 6.	
12. After adjustments, make sure that curling nor twisting is allowed.	
13. Adjust the tape to the under limit guide by rotating P1 and P2 posts, at this time cause the tape to thread along the post frange. Any curling and twisting is allowed.	
14. When the TY7251 is played back, the envelope is required to be even as shown in Figure in Off-Track mode.	 A/C less than 3dB A/B less than 3dB

Adjustment Locations

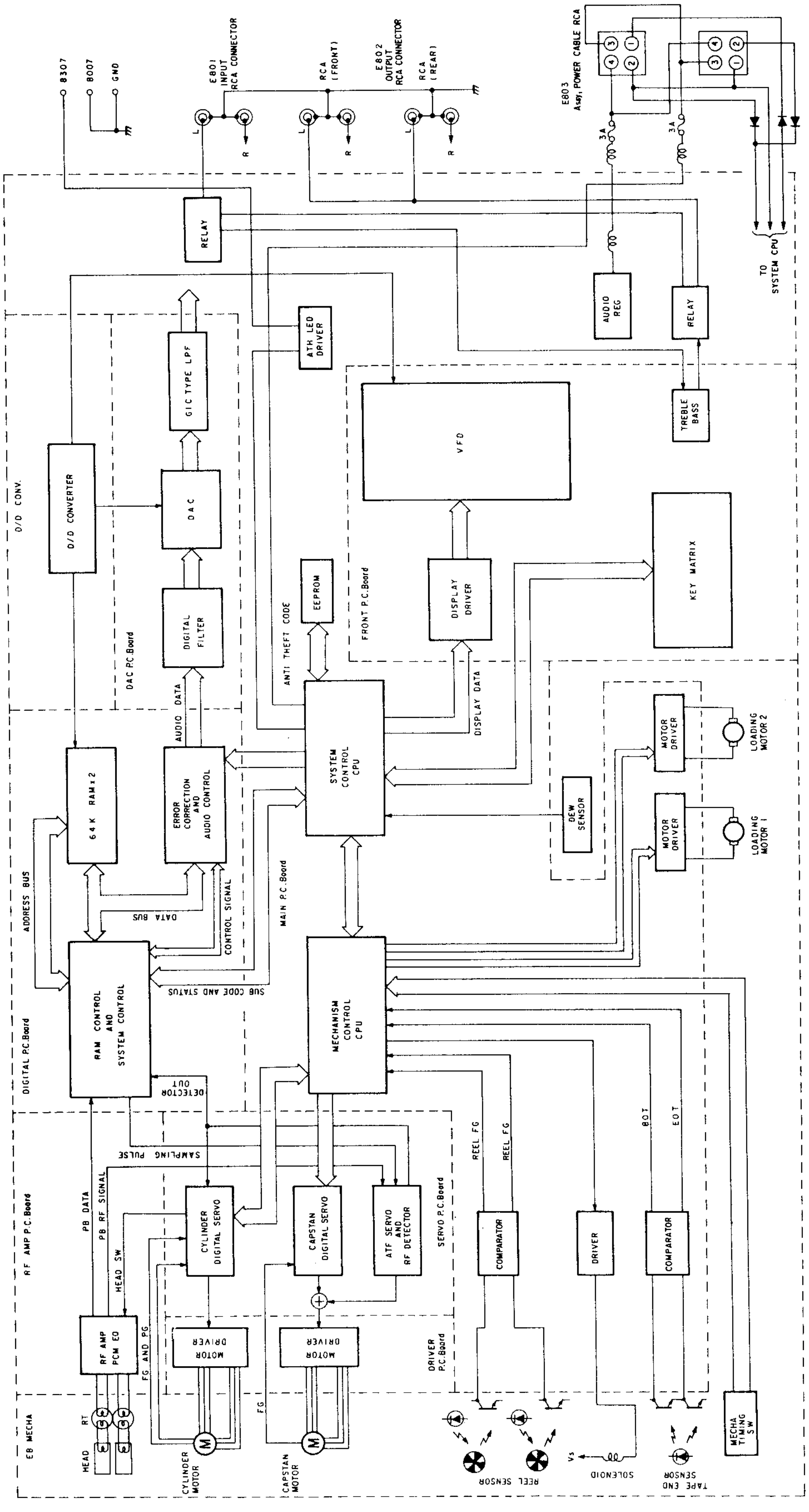

T.P.6101
VR6101
VR6102
VR6103
IC6103
IC6104
IC6105
IC6106
IC6107
IC6101
IC6102
IC6108
IC6109
L6101

Digital P. C. Board

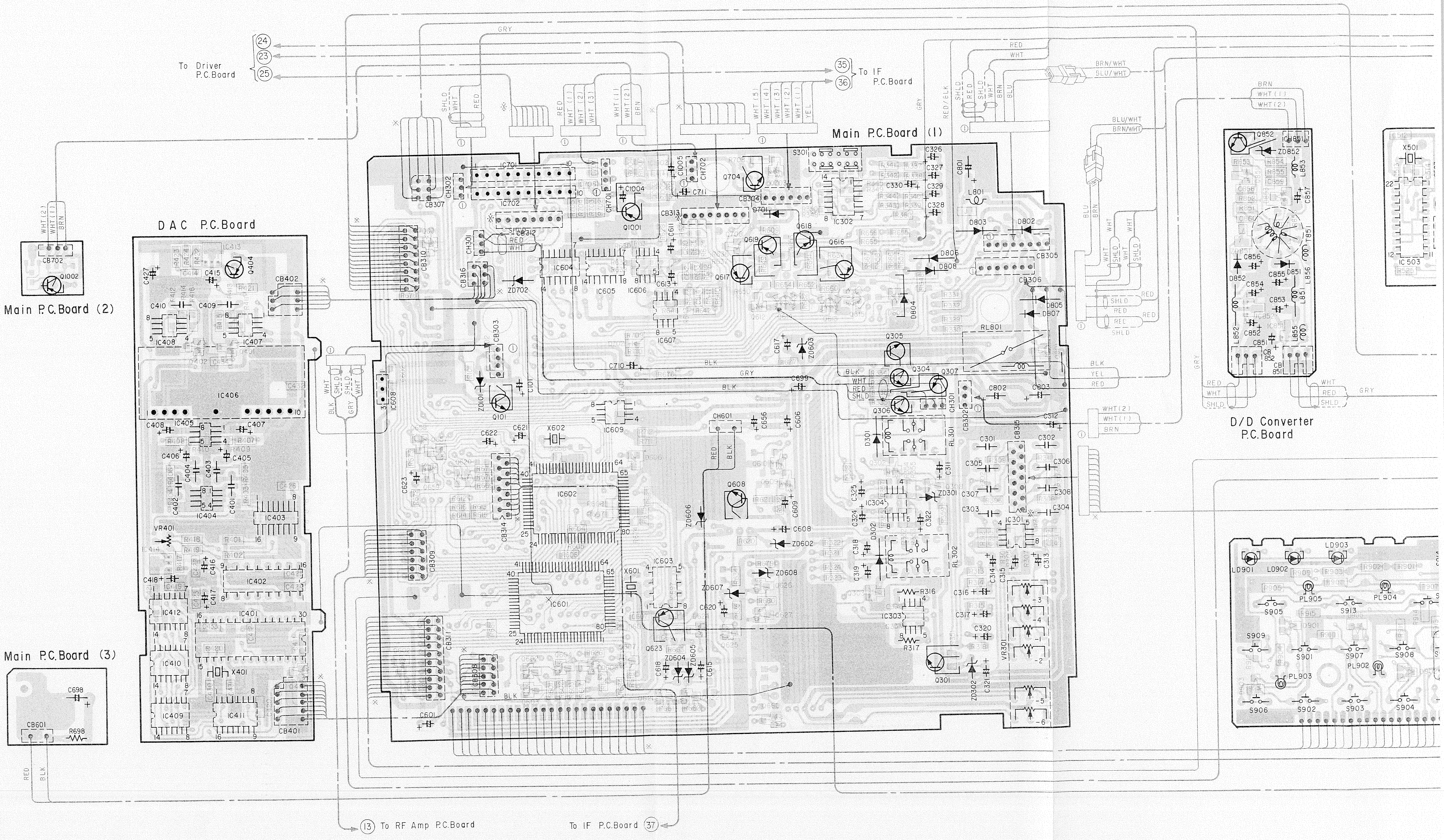

T.P.505
T.P.508
VR502
T.P.510
VR505
VR503
VR506
VR501
VR504
T.P.512
T.P.513
IC501
IC506
IC505
IC507
IC514
IC502
IC503

Servo P. C. Board

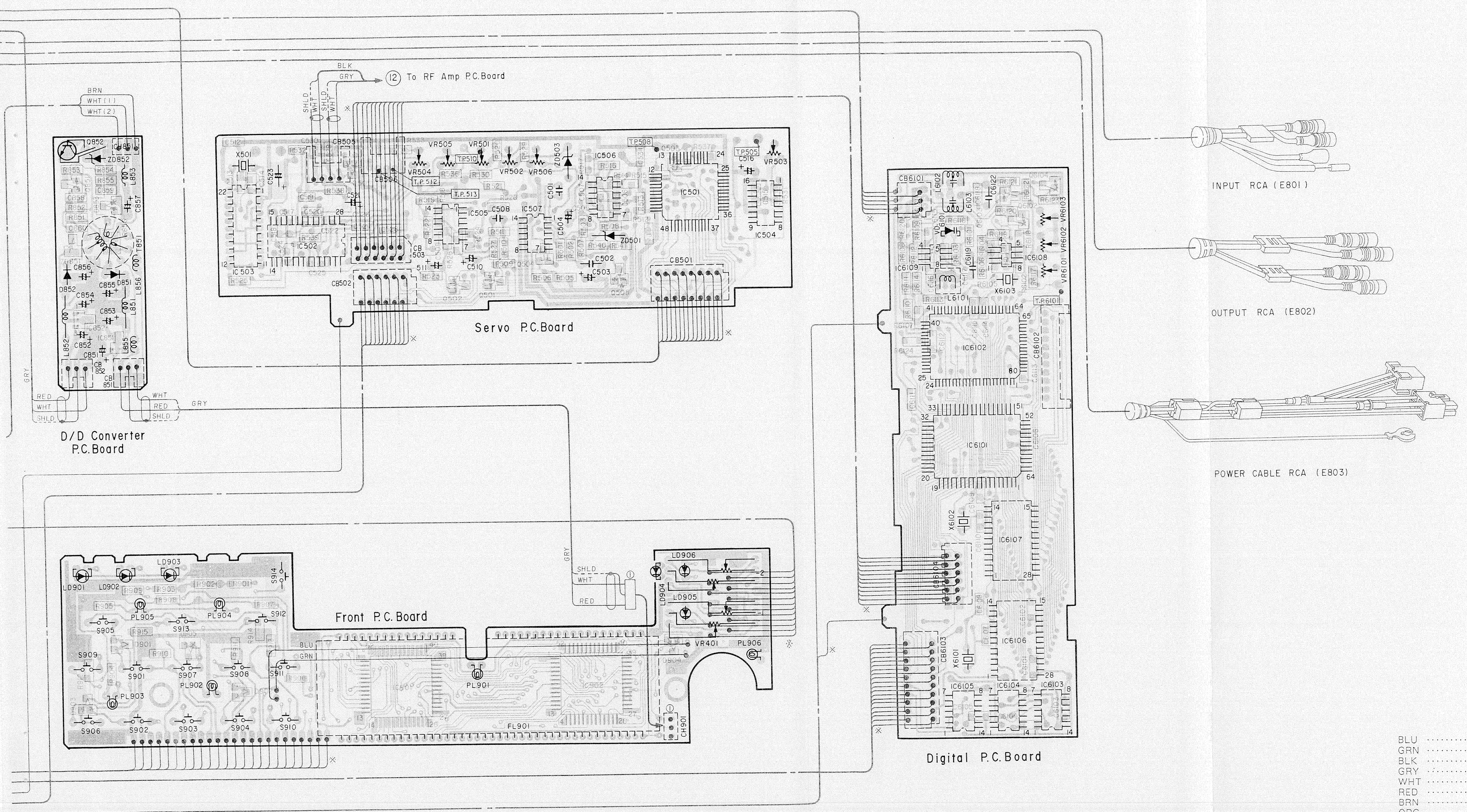
Block Diagram


B307
B007
GND
E801 INPUT RCA CONNECTOR
L
R
RCA (FRONT)
E802 OUTPUT RCA CONNECTOR
RCA (REAR)
E803 Assy, POWER CABLE RCA
3A
3A
TO SYSTEM CPU
RELAY
AUDIO REG
RELAY
TREBLE BASS
ATH LED DRIVER
VFD
KEY MATRIX
DISPLAY DRIVER
FRONT P.C.Board
EEPROM
ANTI THEFT CODE
DISPLAY DATA
SYSTEM CONTROL CPU
DEW SENSOR
MOTOR DRIVER
MOTOR DRIVER
LOADING MOTOR 2
LOADING MOTOR 1
G/C TYPE LPF
D/D CONV.
D/D CONVERTER
DAC
DIGITAL FILTER
DAC P.C.Board
AUDIO DATA
ERROR CORRECTION AND AUDIO CONTROL
64K RAM×2
ADDRESS BUS
DATA BUS
CONTROL SIGNAL
MAIN P.C.Board
SUB CODE AND STATUS
RAM CONTROL AND SYSTEM CONTROL
DIGITAL P.C.Board
MECHANISM CONTROL CPU
DETECTOR OUT
SAMPLING PULSE
REEL FG
REEL FG
BOT
EOT
RF AMP P.C.Board
PB DATA
PB RF SIGNAL
HEAD SW
CYLINDER DIGITAL SERVO
CAPSTAN DIGITAL SERVO
ATF SERVO AND RF DETECTOR
SERVO P.C.Board
COMPARATOR
DRIVER
COMPARATOR
RF AMP PCM EQ
FG AND PG
MOTOR DRIVER
MOTOR DRIVER
DRIVER P.C.Board
FG
E8 MECHA
RT
HEAD
M
CYLINDER MOTOR
M
CAPSTAN MOTOR
REEL SENSOR
Vs
SOLENOID
TAPE END SENSOR
MECHA TIMING SW

Parts Layout on P.C. Boards and Wiring Diagram (1/2) <AO Model Only>

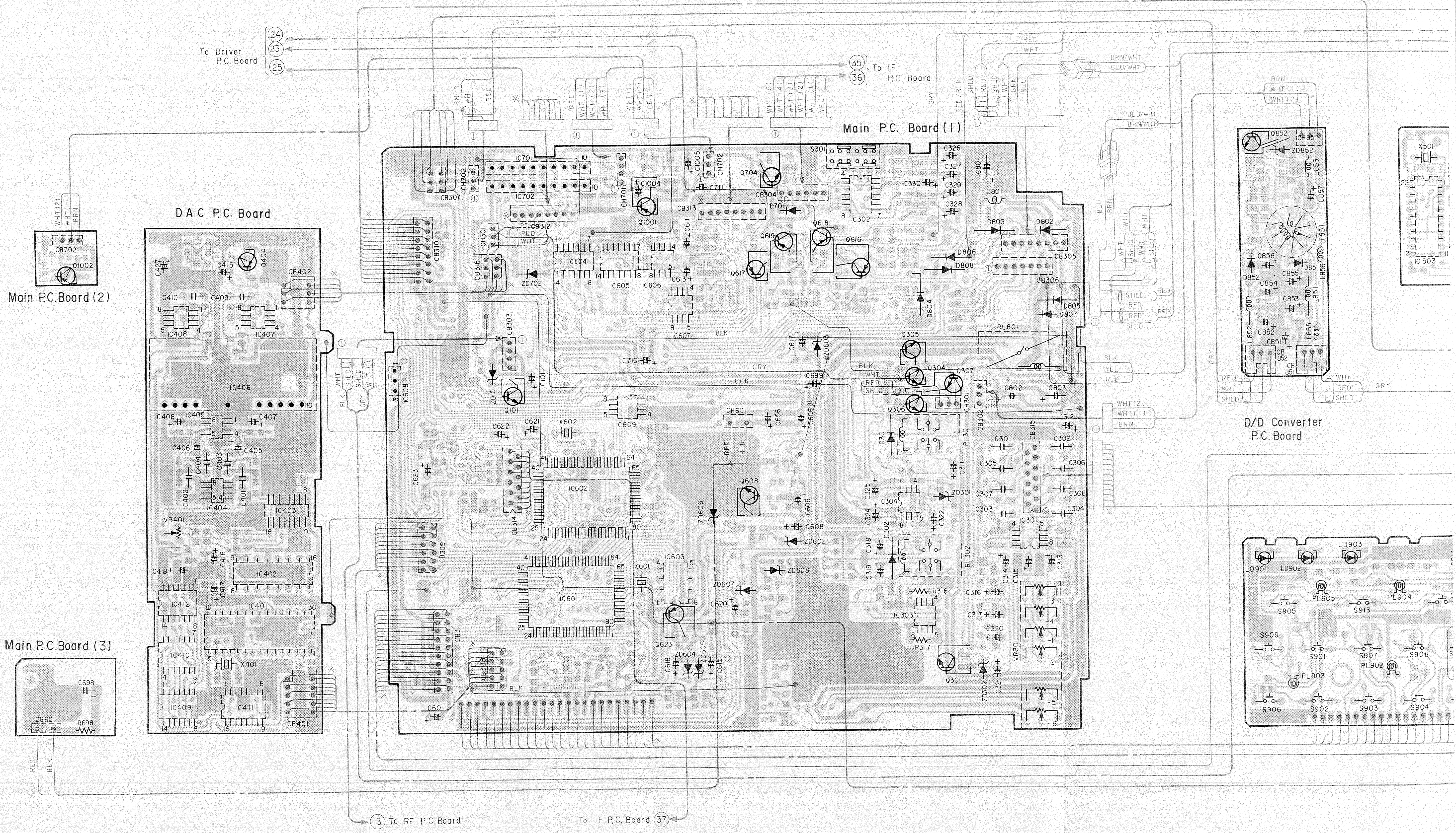


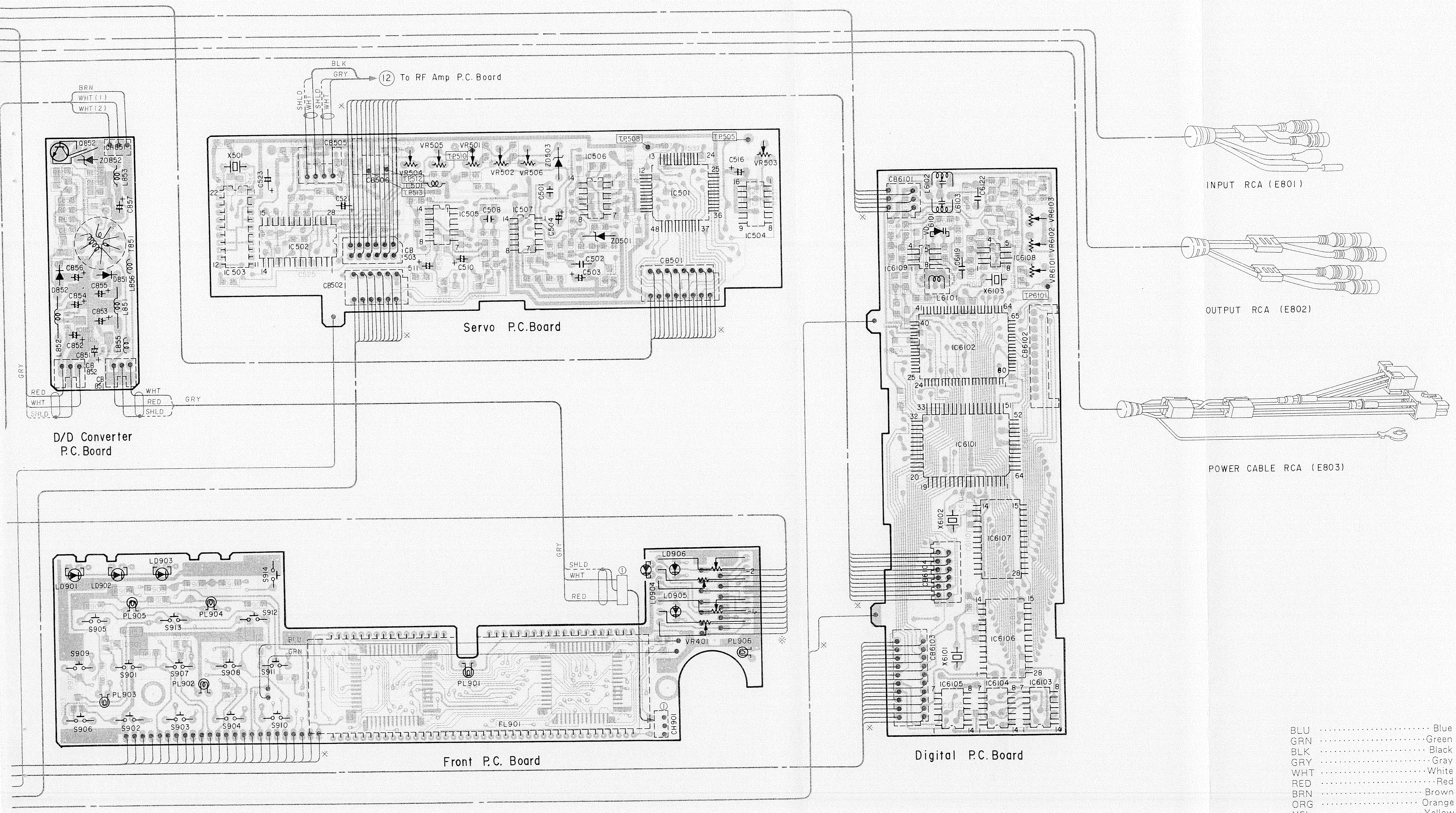
㉔
㉓
㉕
To Driver P.C.Board
㉟
㊱
To IF P.C.Board
Main P.C.Board (1)
DAC P.C.Board
Main P.C.Board (2)
Main P.C.Board (3)
D/D Converter P.C.Board
⑬ To RF Amp P.C.Board
To IF P.C.Board ㊲


⑫ To RF Amp P.C.Board
BLK
GRY
BRN
WHT(1)
WHT(2)
SHLD
WHT
RED
GRY
GRN
BLU
D/D Converter P.C.Board
Servo P.C.Board
Front P.C.Board
Digital P.C.Board
INPUT RCA (E801)
OUTPUT RCA (E802)
POWER CABLE RCA (E803)
IC501
IC502
IC503
IC504
IC505
IC506
IC507
IC6101
IC6102
IC6103
IC6104
IC6105
IC6106
IC6107
IC6108
X501
X6101
X6102
X6103
CB501
CB502
CB503
CB505
CB506
CB6101
CB6102
CB6103
CB6104
VR401
VR501
VR502
VR503
VR504
VR505
VR506
VR6101
VR6102
VR6103
ZD501
ZD503
ZD852
Q852
T851
LD901
LD902
LD903
LD904
LD905
LD906
PL901
PL902
PL903
PL904
PL905
PL906
S901
S902
S903
S904
S905
S906
S907
S908
S909
S910
S911
S912
S913
S914
FL901
CH901
T.P.505
T.P.508
T.P.510
T.P.512
T.P.513
T.P.6101

BLU	Blue
GRN	Green
BLK	Black
GRY	Gray
WHT	White
RED	Red
BRN	Brown
ORG	Orange
YEL	Yellow
PNK	Pink
VIO	Violet
GRN/WHT	Green/White
GRY/WHT	Gray/White
GRY/YEL	Gray/Yellow
GRN/YEL	Green/Yellow
SHLD	Shield

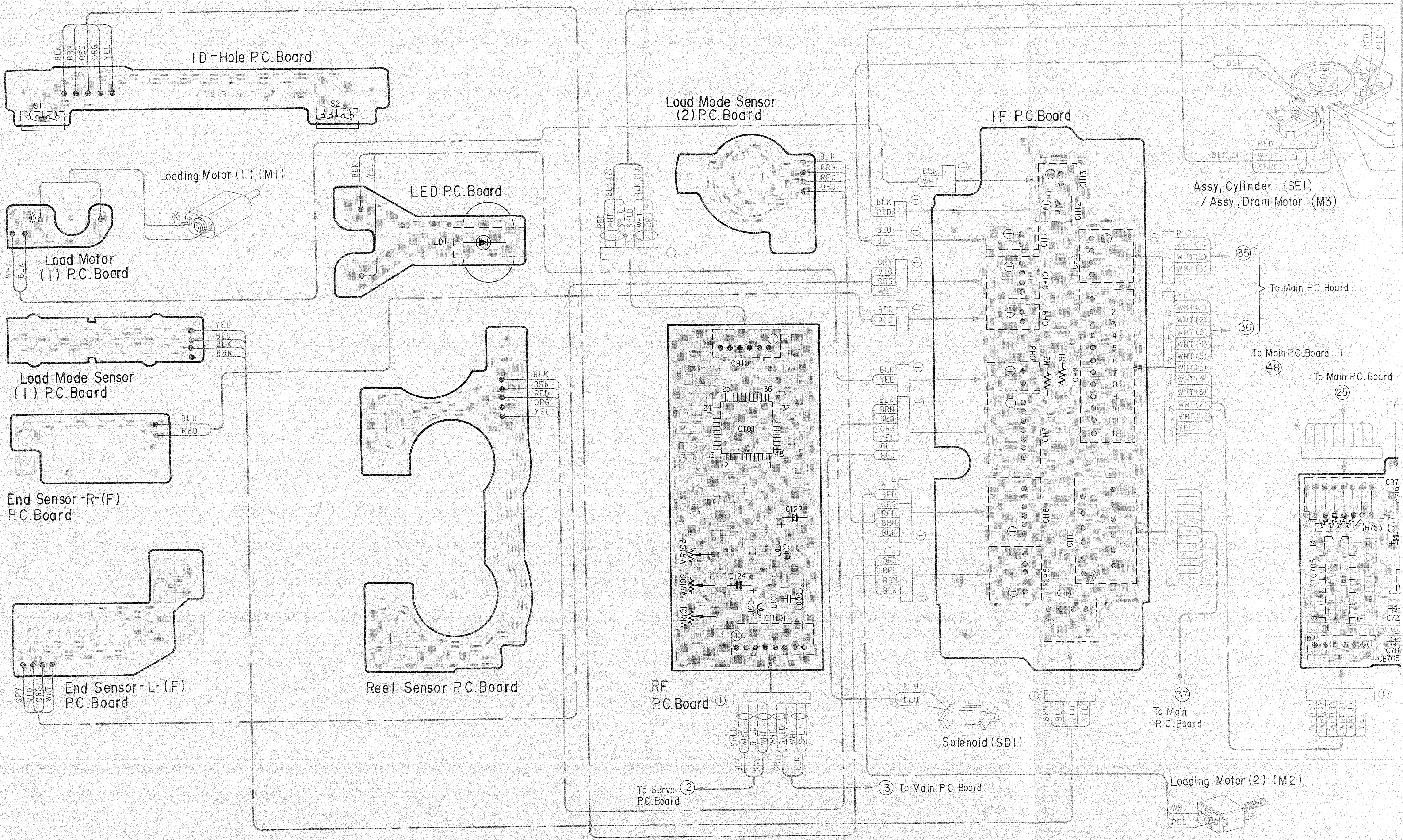
Parts Layout on P.C. Boards and Wiring Diagram (1/2) <EO Model Only>


To Driver P.C. Board
24
23
25
35
36
To IF P.C. Board
Main P.C. Board (1)
Main P.C. Board (2)
Main P.C. Board (3)
DAC P.C. Board
D/D Converter P.C. Board
To RF P.C. Board
13
To IF P.C. Board
37
GRY
RED
WHT
BLK
BRN
YEL
SHLD
BLU
BRN/WHT
BLU/WHT
RED/BLK
WHT (1)
WHT (2)
WHT (3)
WHT (4)
WHT (5)
CB702
Q1002
CB601
C698
R698
IC406
IC408
IC407
IC404
IC403
IC402
IC401
IC412
IC410
IC409
IC411
X401
VR401
CB402
CB401
IC701
IC702
IC602
IC601
IC603
IC604
IC605
IC606
IC607
IC609
IC301
IC302
IC303
IC304
Q101
Q1001
Q301
Q305
Q304
Q306
Q307
Q608
Q616
Q617
Q618
Q619
Q623
Q704
RL801
RL301
RL302
VR301
X601
X602
S301
L801
CB305
CB306
CB307
CB309
CB310
CB311
CB312
CB313
CB314
CB315
CB316
CB302
CB303
CB304
CB308
CH301
CH302
CH601
CH701
CH702
IC608
IC503
X501
Q852
ZD852
T851
LD901
LD902
LD903
PL902
PL903
PL904
PL905
S901
S902
S903
S904
S905
S906
S907
S908
S909
S913


BLK
GRY
⑫ To RF Amp P.C. Board
SHLD
WHT
BRN
WHT (1)
WHT (2)
Q852
CN851
ZD852
L853
C857
T851
C856
D851
D852
C855
C854
C853
L856
L851
L852
C852
L855
C851
CB852
CB851
GRY
RED
WHT
SHLD
D/D Converter P.C. Board
X501
C523
CB505
CB506
VR505
VR501
VR504
VR502
VR506
VR503
TP510
TP512
TP513
L501
ZD503
IC506
IC505
IC507
IC501
IC502
IC503
IC504
C52
C508
C501
C504
C516
C502
C503
C510
ZD501
CB503
CB502
CB501
T.P.508
T.P.505
Servo P.C.Board
CB6101
L6102
C6122
C6119
L6103
VD6101
IC6109
IC6108
X6103
L6101
VR6101
VR6102
VR6103
T.P.6101
IC6102
CB6102
IC6101
X6102
IC6107
CB6104
IC6106
CB6103
X6101
IC6105
IC6104
IC6103
Digital P.C. Board
INPUT RCA (E801)
OUTPUT RCA (E802)
POWER CABLE RCA (E803)
LD901
LD902
LD903
LD904
LD905
LD906
S914
PL905
PL904
S912
S905
S913
S909
S901
S907
S908
S911
PL902
PL903
S906
S902
S903
S904
S910
PL901
FL901
VR401
PL906
CH901
BLU
GRN
SHLD
WHT
RED
GRY
Front P.C. Board

BLU	Blue
GRN	Green
BLK	Black
GRY	Gray
WHT	White
RED	Red
BRN	Brown
ORG	Orange
YEL	Yellow
PNK	Pink
VIO	Violet
GRN/WHT	Green/White
GRY/WHT	Gray/White
GRY/YEL	Gray/Yellow
GRN/YEL	Green/Yellow
SHLD	Shield

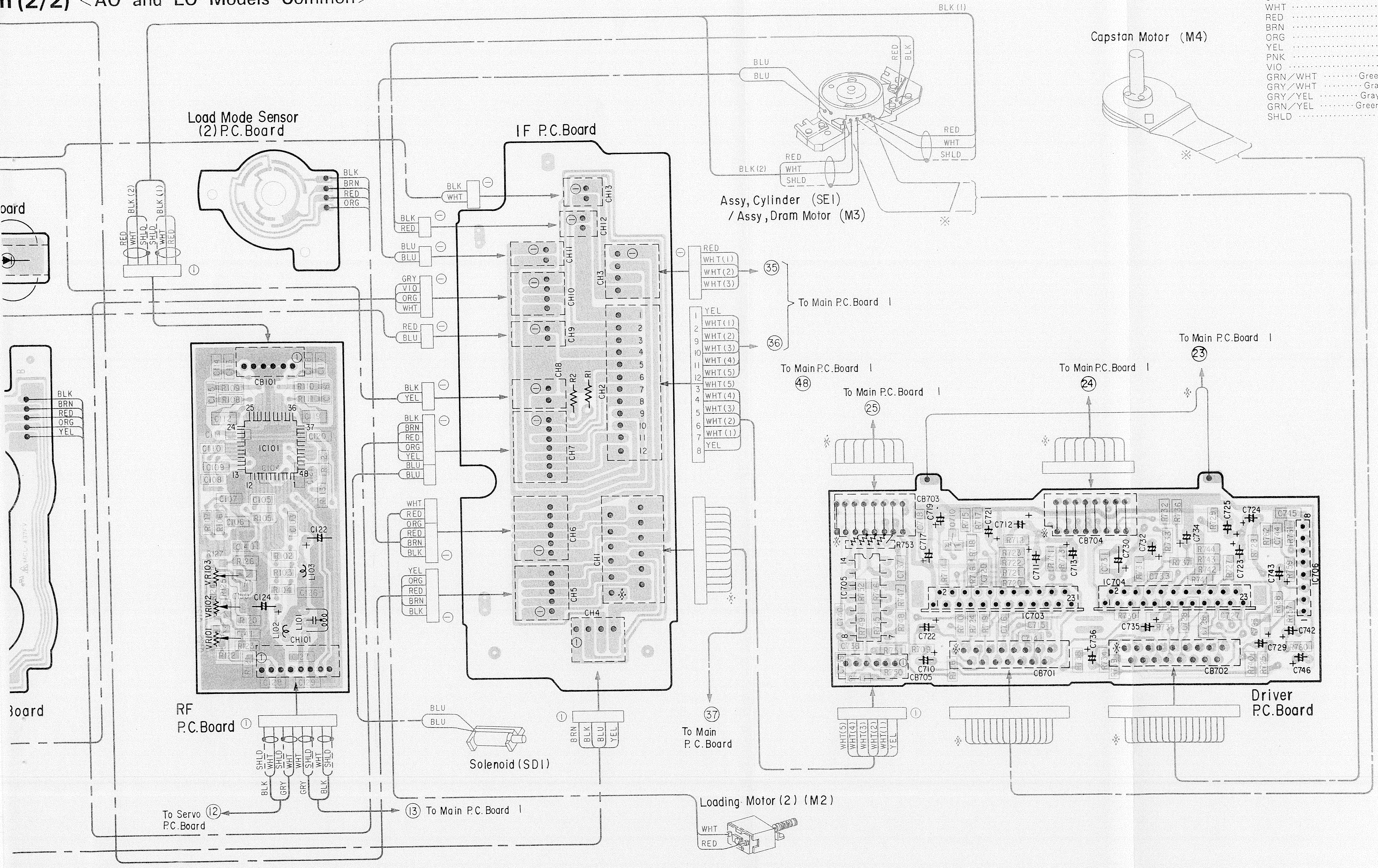
Parts Layout on P.C. Boards and Wiring Diagram (2/2) <AO and EO Models Common>



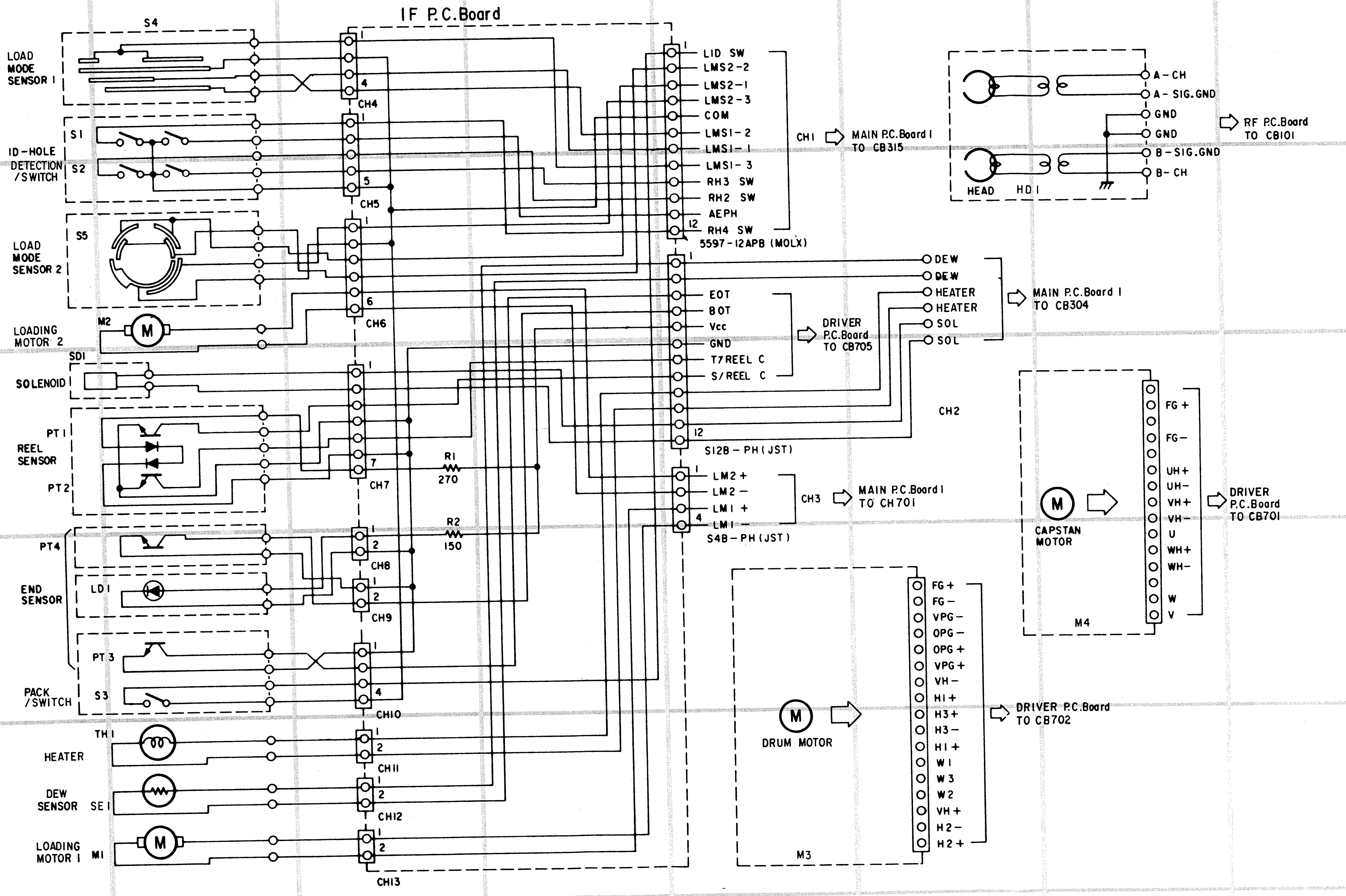
ID-Hole P.C. Board
BLK
BRN
RED
ORG
YEL
S1
S2
Loading Motor (1) (M1)
Load Motor (1) P.C. Board
WHT
BLK
LED P.C. Board
LD1
Load Mode Sensor (1) P.C. Board
YEL
BLU
BLK
BRN
BLU
RED
End Sensor -R- (F) P.C. Board
PT4
End Sensor -L- (F) P.C. Board
S3
GRY
VIO
ORG
WHT
Reel Sensor P.C. Board
BLK
BRN
RED
ORG
YEL
Load Mode Sensor (2) P.C. Board
BLK (2)
BLK (1)
RED
WHT
SHLD
RF P.C. Board
CB101
IC101
VR101
VR102
VR103
L101
L102
L103
C122
C124
CH101
IF P.C. Board
CH1
CH2
CH3
CH4
CH5
CH6
CH7
CH8
CH9
CH10
CH11
CH12
CH13
R1
R2
Assy, Cylinder (SE1) / Assy, Dram Motor (M3)
BLU
BLK (2)
RED
WHT
SHLD
WHT (1)
WHT (2)
WHT (3)
WHT (4)
WHT (5)
35
36
To Main P.C. Board 1
To Main P.C. Board 1
48
To Main P.C. Board
25
CB7
R753
C705
CB705
Solenoid (SD1)
BLU
BRN
BLK
BLU
YEL
37
To Main P.C. Board
To Servo P.C. Board
12
13
To Main P.C. Board 1
Loading Motor (2) (M2)
WHT
RED

m (2/2) <AO and EO Models Common>

BLU	Blue
GRN	Green
BLK	Black
GRY	Gray
WHT	White
RED	Red
BRN	Brown
ORG	Orange
YEL	Yellow
PNK	Pink
VIO	Violet
GRN/WHT	Green/White
GRY/WHT	Gray/White
GRY/YEL	Gray/Yellow
GRN/YEL	Green/Yellow
SHLD	Shield


Load Mode Sensor
(2) P.C. Board
IF P.C. Board
Capstan Motor (M4)
Assy, Cylinder (SE1)
/ Assy, Dram Motor (M3)
oard
RF
P.C. Board ①
Driver
P.C. Board
Solenoid (SD1)
Loading Motor (2) (M2)
To Main P.C. Board Ⅰ
To Main P.C. Board Ⅰ ㊽
To Main P.C. Board Ⅰ ㉕
To Main P.C. Board Ⅰ ㉔
To Main P.C. Board Ⅰ ㉓
㉟
㊱
㊲ To Main P.C. Board
⑬ To Main P.C. Board Ⅰ
To Servo ⑫ P.C. Board
BLK (1)
BLK (2)
BLU
RED
WHT
SHLD
BLK
BRN
ORG
YEL
GRY
VIO
WHT (1)
WHT (2)
WHT (3)
WHT (4)
WHT (5)
CH1
CH2
CH3
CH4
CH5
CH6
CH7
CH8
CH9
CH10
CH11
CH12
CH13
R1
R2
CB101
IC101
VR101
VR102
VR103
C122
C124
L101
L102
L103
CH101
CB701
CB702
CB703
CB704
CB705
IC703
IC704
IC705
IC706
R753
C710
C712
C713
C717
C719
C721
C722
C723
C724
C725
C729
C730
C732
C734
C735
C736
C742
C743
C746

Schematic Diagram (1/4)

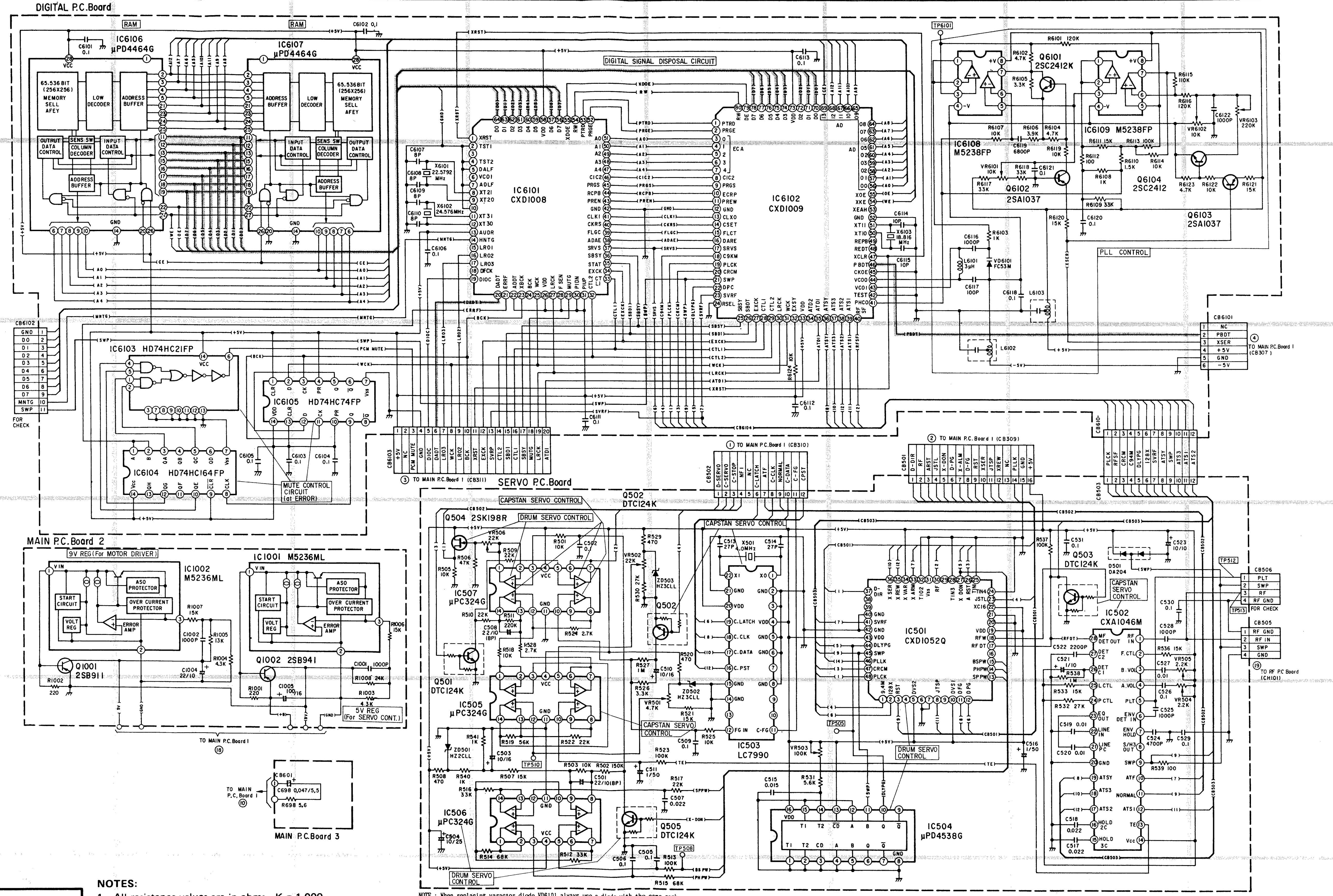

IF P.C.Board
S4
LOAD MODE SENSOR 1
S1
ID-HOLE DETECTION /SWITCH
S2
S5
LOAD MODE SENSOR 2
LOADING MOTOR 2
M2
M
SD1
SOLENOID
PT1
REEL SENSOR
PT2
PT4
END SENSOR
LD1
PT3
PACK /SWITCH
S3
TH1
HEATER
DEW SENSOR
SE1
LOADING MOTOR 1
M1
CH4
CH5
CH6
CH7
CH8
CH9
CH10
CH11
CH12
CH13
R1
270
R2
150
LID SW
LMS2-2
LMS2-1
LMS2-3
COM
LMS1-2
LMS1-1
LMS1-3
RH3 SW
RH2 SW
AEPH
RH4 SW
5597-12APB (MOLX)
CH1
MAIN P.C.Board 1 TO CB315
EOT
BOT
Vcc
GND
T/REEL C
S/REEL C
DRIVER P.C.Board TO CB705
S12B-PH(JST)
DEW
DEW
HEATER
HEATER
SOL
SOL
MAIN P.C.Board 1 TO CB304
CH2
LM2+
LM2−
LM1+
LM1−
S4B-PH(JST)
CH3
MAIN P.C.Board 1 TO CH701
HEAD
HD1
A-CH
A-SIG.GND
GND
GND
B-SIG.GND
B-CH
RF P.C.Board TO CB101
CAPSTAN MOTOR
M4
FG+
FG−
UH+
UH−
VH+
VH−
U
WH+
WH−
W
V
DRIVER P.C.Board TO CB701
DRUM MOTOR
M3
FG+
FG−
VPG−
OPG−
OPG+
VPG+
VH−
H1+
H3+
H3−
H1+
W1
W3
W2
VH+
H2−
H2+
DRIVER P.C.Board TO CB702

NOTES:
1. All resistance values are in ohms. K = 1,000
2. All capacitance values are in microfarads. $P = \frac{1}{1{,}000{,}000}$

5 7 0 0

Schematic Diagram (2/4)

IC	IC6106 IC1002	IC6103 IC6104	IC6107 IC6105 IC1001	IC6101 IC505 ∼ IC507	IC503	IC6102	IC504	IC501 IC6108	IC6109 IC502	
Transistor (Q)	Q1001	Q1002	Q504	Q501 Q505	Q502				Q6101 Q6102 Q503	Q6104 Q6103



DIGITAL P.C.Board
RAM
IC6106
µPD4464G
IC6107
µPD4464G
65,536 BIT (256X256) MEMORY SELL AFEY
LOW DECODER
ADDRESS BUFFER
OUTPUT DATA CONTROL
SENS SW COLUMN DECODER
INPUT DATA CONTROL
DIGITAL SIGNAL DISPOSAL CIRCUIT
IC6101
CXD1008
IC6102
CXD1009
X6101 22.5792 MHz
X6102 24.576MHz
X6103 16.816 MHz
TP6101
Q6101 2SC2412K
IC6108 M5238FP
IC6109 M5238FP
Q6102 2SA1037
Q6104 2SC2412
Q6103 2SA1037
VD6101 FC53M
PLL CONTROL
CB6101
NC
PBDT
XSER
+5V
GND
-5V
TO MAIN P.C.Board 1 (CB307)
CB6102
GND
D0
D1
D2
D3
D4
D5
D6
D7
MNTG
SWP
FOR CHECK
IC6103 HD74HC21FP
IC6105 HD74HC74FP
IC6104 HD74HC164FP
MUTE CONTROL CIRCUIT (at ERROR)
CB6103
CB6104
③ TO MAIN P.C.Board 1 (CB311)
① TO MAIN P.C.Board 1 (CB310)
② TO MAIN P.C.Board 1 (CB309)
MAIN P.C.Board 2
9V REG (For MOTOR DRIVER)
IC1002 M5236ML
IC1001 M5236ML
START CIRCUIT
ASO PROTECTOR
OVER CURRENT PROTECTOR
VOLT REG
ERROR AMP
Q1001 2SB911
Q1002 2SB941
5V REG (For SERVO CONT.)
TO MAIN P.C.Board 1 ⑱
TO MAIN P.C.Board 1 ⑩
CB601
C698 0.047/5.5
R698 5.6
MAIN P.C.Board 3
SERVO P.C.Board
CAPSTAN SERVO CONTROL
DRUM SERVO CONTROL
Q504 2SK198R
Q502 DTC124K
Q501 DTC124K
IC507 µPC324G
IC505 µPC324G
IC506 µPC324G
ZD501 HZ2CLL
ZD502 HZ3CLL
ZD503 HZ3CLL
IC503 LC7990
X501 4.0MHz
Q505 DTC124K
TP510
TP508
TP505
IC501 CXD1052Q
IC504 µPD4538G
Q503 DTC124K
D501 DA204
IC502 CXA1046M
TP512
TP513
CB502
CB503
CB501
CB506
PLT
SWP
RF
RF GND
FOR CHECK
CB505
RF GND
RF IN
SWP
GND
⑲ TO RF P.C.Board (CH101)

NOTE : When replacing varactor diode, VD6101 always use a diode with the same rank.

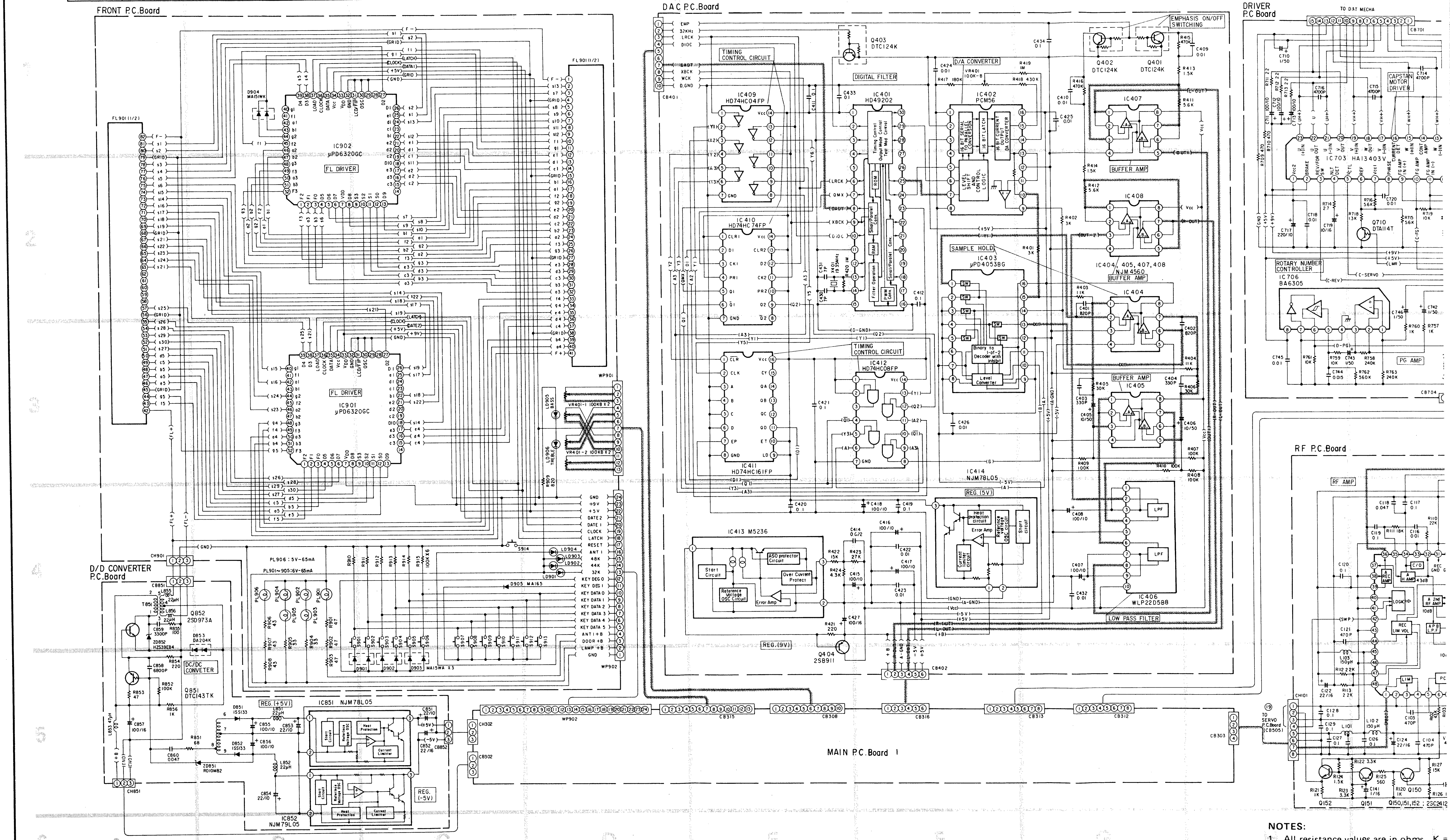
5 7 0 0

NOTES:

1. All resistance values are in ohms. K = 1,000
2. All capacitance values are in microfarads. $P = \frac{1}{1,000,000}$

Schematic Diagram (3/4)

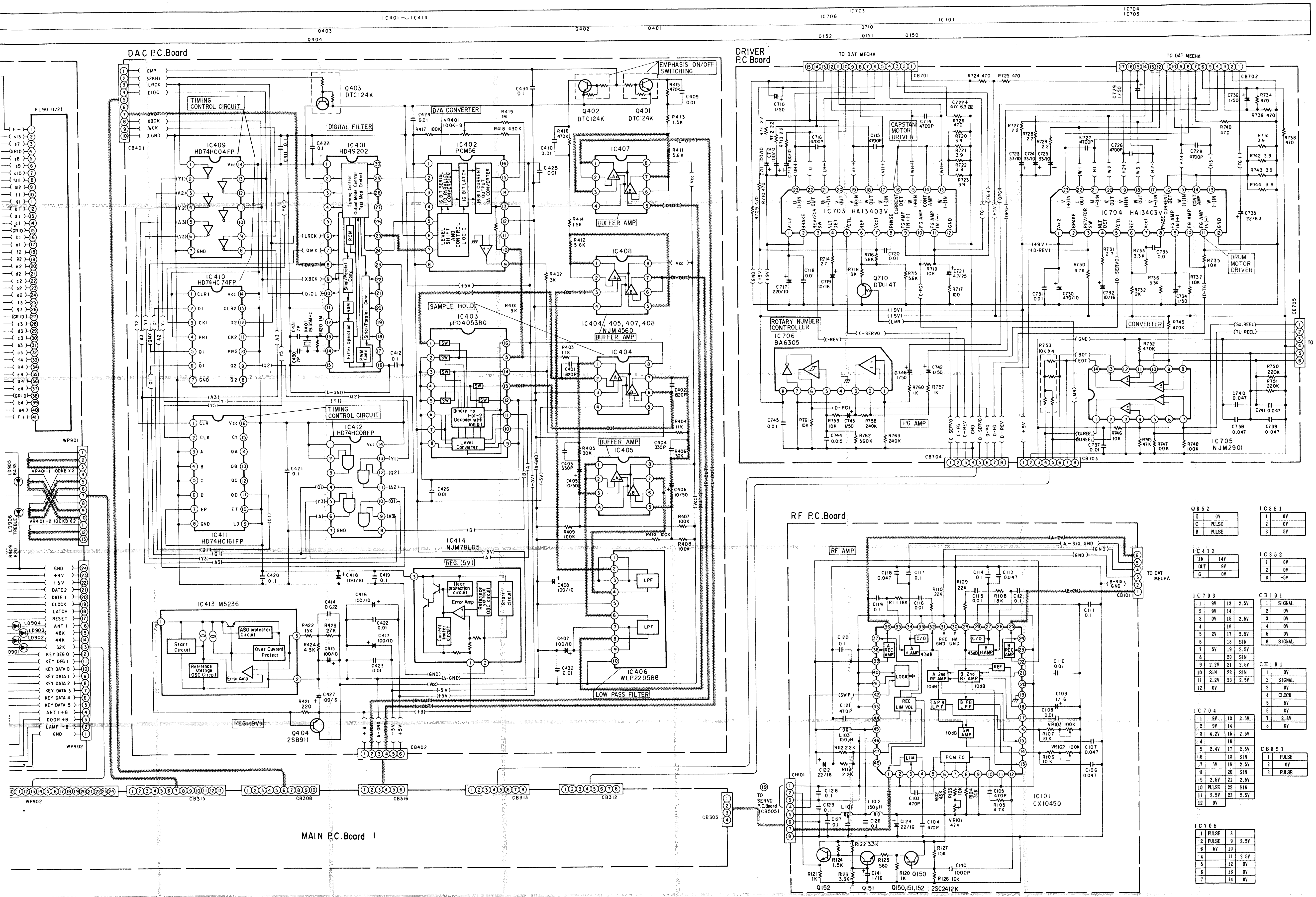
IC	IC902 IC901 IC851 IC852	IC401 ~ IC414	IC706 IC703
Transistor (Q)	Q852 Q851	Q403 Q404 Q402 Q401	Q710 Q152 Q151 Q150



FRONT P.C.Board
FL901(1/2)
FL901(1/2)
D904 MA151WK
IC902 μPD6320GC
FL DRIVER
IC901 μPD6320GC
FL DRIVER
WP901
VR401-1 100KB X2
VR401-2 100KB X2
LD925 BASS
LD906 TREBLE
R909 820
S914
LD904
LD903
LD902
LD901
D905 MA165
PL906 : 5V-65mA
PL901~905:6V-65mA
PL906
PL904
PL902
PL901
PL905
PL903
R906 43
R907 43
R908 43
R905 33
R904 33
R903 47
R902 47
R901 47
R910
R911
R912
R913
R914
R915 100KX6
S901
S902
S903
S904
S905
S906
S907
S908
S909
S910
S911
S912
S913
D901
D902
D903 MA15WA X3
WP902
GND
+9V
+5V
DATE 2
DATE 1
CLOCK
LATCH
RESET
ANT I
48K
44K
32K
KEY DEG 0
KEY DEG 1
KEY DATA 0
KEY DATA 1
KEY DATA 2
KEY DATA 3
KEY DATA 4
KEY DATA 5
ANT I +B
DOOR +B
LAMP +B
GND
CH901
D/D CONVERTER P.C.Board
CB851
T851
L855 22μH
L856 22μH
Q852 2SD973A
C859 3300P
R855 100
D853 DA204K
ZD852 HZS33EB4
C858 6800P
R854 220
DC/DC CONVETER
R852 100K
R853 47
Q851 DTC143TK
R856 1K
L853 47μH
C857 100/16
R851 68
C860 0.047
ZD851 RD10MB2
CH851
D851 1SS133
D852 1SS133
REG.(+5V)
L851 22μH
C855 100/10
C853 22/10
C856 100/10
IC851 NJM78L05
C851 22/10
C852 22/16
CB852
L852 22μH
C854 22/10
REG. (-5V)
IC852 NJM79L05
CH302
CB302
WP902
CB315
CB308
CB316
CB313
CB312
CB303
MAIN P.C.Board I
DAC P.C.Board
EMP
32KHz
LRCK
DIOC
DADT
XBCK
WCK
D.GND
CB401
TIMING CONTROL CIRCUIT
IC409 HD74HC04FP
IC410 HD74HC74FP
IC411 HD74HC161FP
Q403 DTC124K
DIGITAL FILTER
IC401 HD49202
C433 0.1
C431 1P
X401 19.35MHz
R420 1M
C430 1P
C412 0.1
TIMING CONTROL CIRCUIT
IC412 HD74HC08FP
C421 0.1
C420 0.1
C418 100/10
C419 0.1
IC413 M5236
Start Circuit
ASO protector Circuit
Over Current Protect
Reference Voltage OSC Circuit
Error Amp
R422 15K
R424 4.3K
R423 27K
C415 100/10
C414 0.022
C416 100/10
C422 0.01
C417 100/10
C423 0.01
R421 220
C427 100/16
Q404 2SB911
REG.(9V)
CB402
D/A CONVERTER
C424 0.01
R417 180K
VR401 100K-B
R419 1M
R418 430K
IC402 PCM56
16 BIT SERIAL TO PARALLEL CONVERSION
16 BIT LATCH
16 BIT CURRENT OUTPUT DA CONVERTER
LEVEL SHIFT AND CONTROL LOGIC
SAMPLE HOLD
IC403 μPD4053BG
Binary to 1-of-2 Decoder with Inhibit
Level Converter
C426 0.01
R401 3K
R402 3K
IC414 NJM78L05
REG.(5V)
Heat protection circuit
Error Amp
Reference Voltage OSC Circuit
Start circuit
Current Limiter circuit
C434 0.1
Q402 DTC124K
Q401 DTC124K
EMPHASIS ON/OFF SWITCHING
R415 470K
C409 0.01
R413 1.5K
R416 470K
C410 0.01
C425 0.01
IC407
R411 5.6K
R414 1.5K
BUFFER AMP
R412 5.6K
IC408
IC404, 405, 407, 408 NJM4560
BUFFER AMP
IC404
R403 11K
C401 820P
C402 820P
R404 11K
BUFFER AMP
IC405
R405 30K
C404 330P
R406 30K
C403 330P
C405 10/50
C406 10/50
R407 100K
R409 100K
R410 100K
R408 100K
C408 100/10
C407 100/10
C432 0.01
IC406 WLP22D5B8
LPF
LPF
LOW PASS FILTER
R-OUT
L-OUT
DRIVER P.C.Board
TO DAT MECHA
CB701
C710 1/50
C716 4700P
C715 4700P
C714 4700P
CAPSTAN MOTOR DRIVER
IC703 HA13403V
R709 470
R710 470
R711 22
R712 2.2
R713 2.2
C711 100/10
C712 100/10
C713 100/10
R714 2.7
C718 0.01
R716 56K
C720 0.01
R718 13K
Q710 DTA114T
R715 56K
R719 10K
C719 10/16
C717 220/10
ROTARY NUMBER CONTROLLER
IC706 BA6305
C746 1/50
C757 1/50
R760 1K
R757 1K
C745 0.01
R761 10K
R759 10K
C743 1/50
R758 240K
C744 0.015
R762 560K
R763 240K
PG AMP
CB704
RF P.C.Board
RF AMP
C118 0.047
C117 0.1
R110 22K
C119
R111 18K
C116 0.01
C120 0.1
REC AMP
H AMP
LOGIC
A 2nd RF AMP
10dB
43dB
REC LIM VOL
A&B LPF
C121 470P
L103 150μH
R112 2.2K
LIM
C122 22/16
R113 2.2K
CH101
TO SERVO P.C.Board (CB505)
C128 0.1
C129 0.1
L101
L102 150μH
C103 470P
C127 0.1
C126 0.1
C124 22/16
C104 470P
R122 3.3K
R124 1.5K
R125 560
R127 15K
R121 1K
R123 3.3K
C141 1/16
R120 1K
Q150
R126
Q152
Q151
Q150,151,152 : 2SC2412

NOTES:

1. All resistance values are in ohms. K =


DAC P.C.Board
DRIVER P.C Board
RF P.C.Board
MAIN P.C.Board 1
TIMING CONTROL CIRCUIT
DIGITAL FILTER
D/A CONVERTER
EMPHASIS ON/OFF SWITCHING
BUFFER AMP
SAMPLE HOLD
LOW PASS FILTER
REG.(5V)
REG.(9V)
IC401 HD49202
IC402 PCM56
IC403 µPD4053BG
IC404, 405, 407, 408 NJM4560
IC406 WLP22D5BB
IC409 HD74HC04FP
IC410 HD74HC74FP
IC411 HD74HC161FP
IC412 HD74HC08FP
IC413 M5236
IC414 NJM78L05
Q401 DTC124K
Q402 DTC124K
Q403 DTC124K
Q404 2SB911
CAPSTAN MOTOR DRIVER
IC703 HA13403V
IC704 HA13403V
DRUM MOTOR DRIVER
ROTARY NUMBER CONTROLLER
IC706 BA6305
PG AMP
CONVERTER
IC705 NJM2901
TO DAT MECHA
RF AMP
IC101 CX1045Q
Q150,151,152 : 2SC2412K
TO SERVO P.C.Board (CB505)
FL901(1/21)
WP901
WP902
CB315
CB308
CB316
CB313
CB312
CB303
CB402

Q852

E	0V
C	PULSE
B	PULSE

IC851

1	6V
2	0V
3	5V

IC413

IN	14V
OUT	9V
G	0V

IC852

1	6V
2	0V
3	-5V

IC703

1	9V	13	2.5V
2	9V	14	
3	0V	15	2.5V
4		16	
5	2V	17	2.5V
6		18	SIN
7	5V	19	2.5V
8		20	SIN
9	2.2V	21	2.5V
10	SIN	22	SIN
11	2.2V	23	2.5V
12	0V		

CB101

1	SIGNAL
2	0V
3	0V
4	0V
5	0V
6	SIGNAL

CH101

1	0V
2	SIGNAL
3	0V
4	CLOCK
5	5V
6	0V
7	2.8V
8	0V

IC704

1	9V	13	2.5V
2	9V	14	
3	4.2V	15	2.5V
4		16	
5	2.4V	17	2.5V
6		18	SIN
7	5V	19	2.5V
8		20	SIN
9	2.5V	21	2.5V
10	PULSE	22	SIN
11	2.5V	23	2.5V
12	0V		

CB851

1	PULSE
2	0V
3	PULSE

IC705

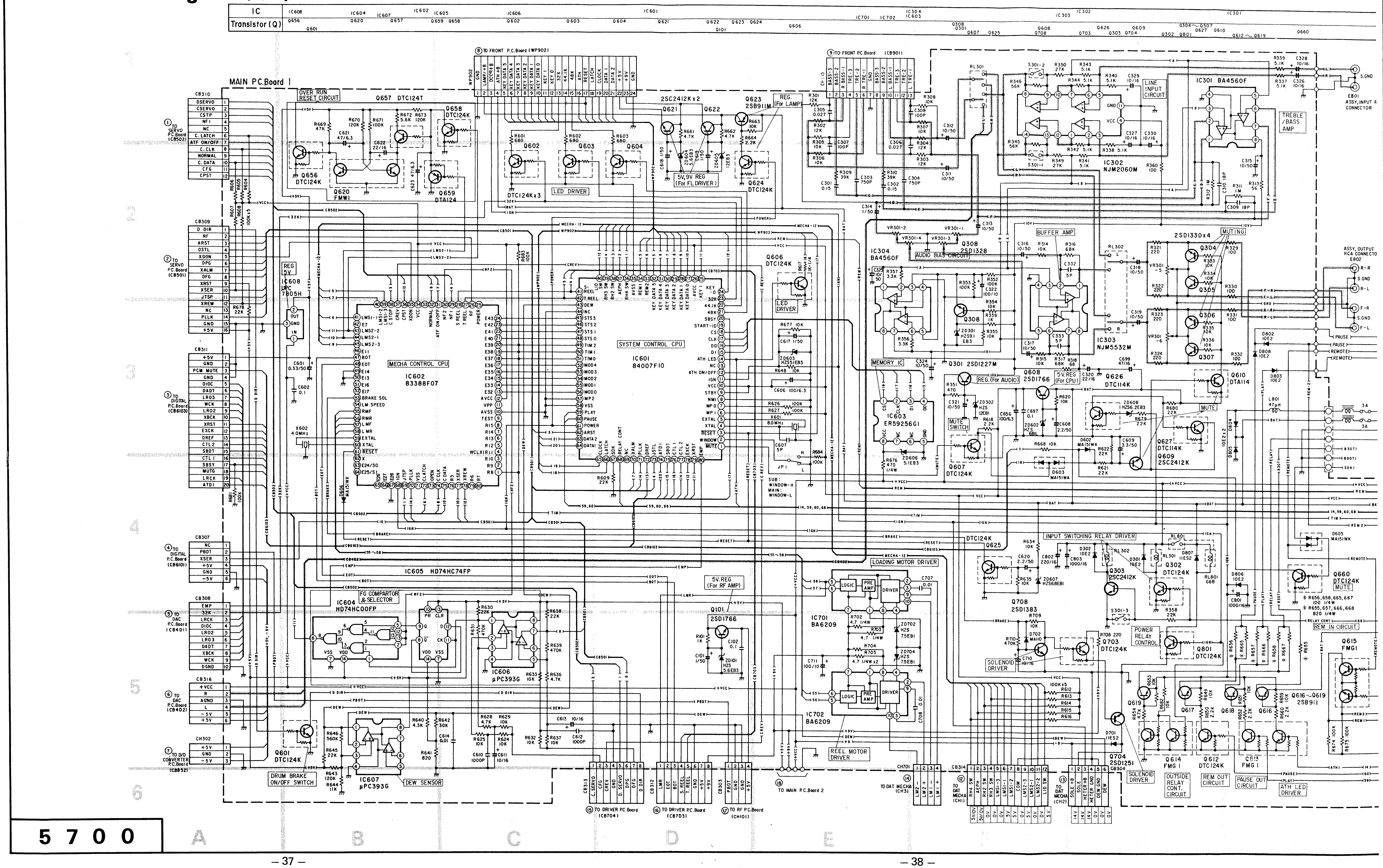
1	PULSE	8	
2	PULSE	9	2.5V
3	5V	10	
4		11	2.5V
5		12	0V
6		13	0V
7		14	0V

NOTES:

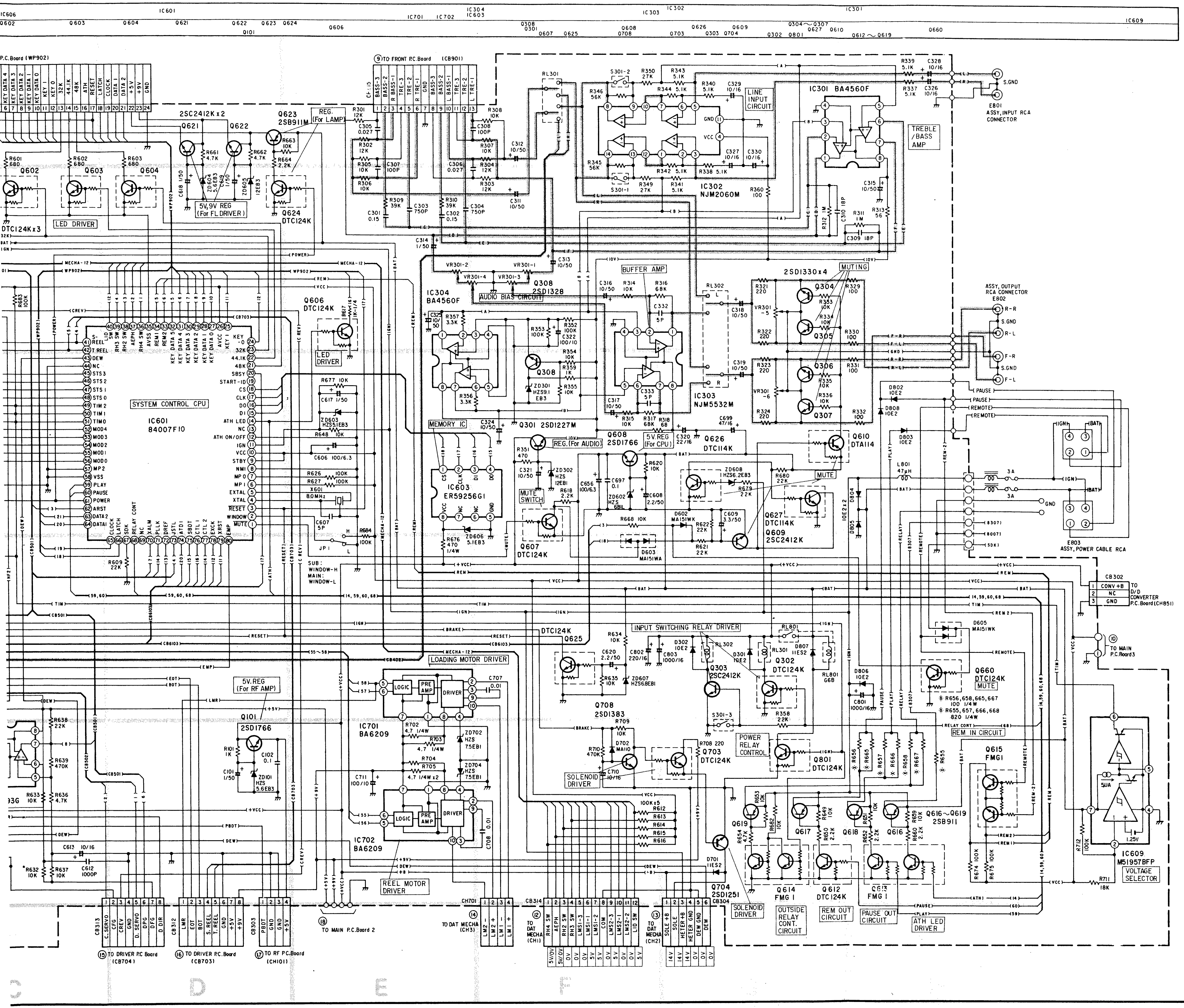
1. All resistance values are in ohms. K = 1,000
2. All capacitance values are in microfarads. $P = \frac{1}{1,000,000}$

5 7 0 0

Schematic Diagram (4/4)


IC
Transistor (Q)
MAIN P.C.Board 1
OVER RUN RESET CIRCUIT
Q657 DTC124T
Q658 DTC124K
Q656 DTC124K
Q620 FMW1
Q659 DTA124
Q602
Q603
Q604
DTC124Kx3
LED DRIVER
2SC2412K x 2
Q621
Q622
Q623 2SB911M
REG. (For LAMP)
5V, 9V REG (For FL DRIVER)
Q624 DTC124K
8 TO FRONT P.C.Board (WP902)
9 TO FRONT P.C.Board (CB901)
REG 5V
IC608 UPC7805H
IC602 83388F07
MECHA CONTROL CPU
IC601 84007F10
SYSTEM CONTROL CPU
Q606 DTC124K
LED DRIVER
X602 4.0MHz
X601 8.0MHz
IC605 HD74HC74FP
FG COMPARTOR & SELECTOR
IC604 HD74HC00FP
IC606 µPC393G
5V.REG (For RF AMP)
Q101 2SD1766
Q601 DTC124K
DRUM BRAKE ON/OFF SWITCH
IC607 µPC393G
DEW SENSOR
LOADING MOTOR DRIVER
IC701 BA6209
IC702 BA6209
REEL MOTOR DRIVER
IC301 BA4560F
LINE INPUT CIRCUIT
IC302 NJM2060M
TREBLE /BASS AMP
IC304 BA4560F
AUDIO BIAS CIRCUIT
Q308 2SD1328
BUFFER AMP
IC303 NJM5532M
2SD1330x4
MUTING
Q304
Q305
Q306
Q307
MEMORY IC
IC603 ER59256G1
Q301 2SD1227M
REG. (For AUDIO)
Q608 2SD1766
5V.REG (For CPU)
Q626 DTC114K
Q610 DTA114
MUTE SWITCH
Q607 DTC124K
MUTE
Q627 DTC114K
Q609 2SC2412K
INPUT SWITCHING RELAY DRIVER
Q625 DTC124K
Q303 2SC2412K
Q302 DTC124K
Q660 DTC124K
MUTE
Q708 2SD1383
Q703 DTC124K
SOLENOID DRIVER
POWER RELAY CONTROL
Q801 DTC124K
REM IN CIRCUIT
Q615 FMG1
Q704 2SD1251
SOLENOID DRIVER
Q614 FMG1
OUTSIDE RELAY CONT. CIRCUIT
Q612 DTC124K
REM OUT CIRCUIT
Q616~Q619 2SB911
PAUSE OUT CIRCUIT
ATH LED DRIVER
※ R656, 658, 665, 667 100 1/4W
※ R655, 657, 666, 668 820 1/4W
1 TO SERVO P.C.Board (CB502)
2 TO SERVO P.C.Board (CB501)
3 TO DIGITAL P.C.Board (CB6103)
4 TO DIGITAL P.C.Board (CB6101)
5 TO DAC P.C.Board (CB401)
6 TO DAC P.C.Board (CB402)
7 TO D/D CONVERTER P.C.Board (CB852)
15 TO DRIVER P.C.Board (CB704)
16 TO DRIVER P.C.Board (CB703)
17 TO RF P.C.Board (CH101)
18 TO MAIN P.C.Board 2
14 TO DAT MECHA (CH3)
12 TO DAT MECHA (CH1)
13 TO DAT MECHA (CH2)
E801 ASSY, INPUT RCA CONNECTOR
ASSY, OUTPUT RCA CONNECTOR E802
A
B
C
D
E
1
2
3
4
5
6

5700


IC606
IC601
IC701
IC702
IC304
IC603
IC303
IC302
IC301
IC609
P.C.Board (WP902)
⑨ TO FRONT P.C.Board (CB9011)
2SC2412K x 2
Q621
Q622
Q623 2SB911M
REG. (For LAMP)
5V, 9V REG (For F.L DRIVER)
Q624 DTC124K
LED DRIVER
DTC124K x 3
IC301 BA4560F
LINE INPUT CIRCUIT
TREBLE /BASS AMP
IC302 NJM2060M
S.GND
E801 ASSY, INPUT RCA CONNECTOR
BUFFER AMP
AUDIO BIAS CIRCUIT
IC304 BA4560F
Q308 2SD1328
2SD1330 x 4
MUTING
Q304
Q305
Q306
Q307
IC303 NJM5532M
ASSY, OUTPUT RCA CONNECTOR E802
R-R
S.GND
R-L
F-R
S.GND
F-L
SYSTEM CONTROL CPU
IC601 84007F10
Q606 DTC124K
LED DRIVER
MEMORY IC
IC603 ER59256G1
Q301 2SD1227M
REG. (For AUDIO)
Q608 2SD1766
5V.REG (For CPU)
Q626 DTC114K
Q610 DTA114
MUTE
MUTE SWITCH
Q607 DTC124K
Q627 DTC114K
Q609 2SC2412K
E803 ASSY, POWER CABLE RCA
IGN
BAT
GND
3A
CB302
CONV +B
NC
GND
TO D/D CONVERTER P.C.Board (CH851)
⑩ TO MAIN P.C.Board 3
INPUT SWITCHING RELAY DRIVER
Q625 DTC124K
RL301
RL302
RL801
Q303 2SC2412K
Q302 DTC124K
D605 MA151WK
Q660 DTC124K
MUTE
LOADING MOTOR DRIVER
5V.REG (For RF AMP)
Q101 2SD1766
IC701 BA6209
IC702 BA6209
LOGIC
PRE AMP
DRIVER
REEL MOTOR DRIVER
Q708 2SD1383
Q703 DTC124K
SOLENOID DRIVER
POWER RELAY CONTROL
Q801 DTC124K
REM IN CIRCUIT
Q615 FMG1
※ R656, 658, 665, 667 100 1/4W
※ R655, 657, 666, 668 820 1/4W
Q616～Q619 2SB911
Q614 FMG1
Q612 DTC124K
Q613 FMG1
Q704 2SD1251
SOLENOID DRIVER
OUTSIDE RELAY CONT. CIRCUIT
REM OUT CIRCUIT
PAUSE OUT CIRCUIT
ATH LED DRIVER
IC609 M51957BFP
VOLTAGE SELECTOR
⑮ TO DRIVER P.C.Board (CB7041)
⑯ TO DRIVER P.C.Board (CB7031)
⑰ TO RF P.C.Board (CH1011)
⑱ TO MAIN P.C.Board 2
⑭ TO DAT MECHA (CH3)
⑫ TO DAT MECHA (CH1)
⑬ TO DAT MECHA (CH2)
C
D
E
F

	E	C	B
Q601	0V	5V	0V
Q656	0V	5V	0V
Q622	0V		0.9V
Q659	1V	0V	0V
Q658	0V	0.9V	0V
Q602	0V	12.6V	0V
Q603	0V	12.6V	0V
Q604	0V	0V	5V
Q621	5V	12V	5.6V
Q622	11.5V	14V	12.9V
Q624	0V	0V	5V
Q606	0V	12.6V	0V
Q607	0V	0V	5V
Q608	5V	14V	6V
Q308	5V	5V	9.2V
Q301	10V	14V	10.6V
Q304 ≀ Q307	0V	0V	0V
Q627	0V	13V	0V
Q626	0V	0V	3V
Q302	0V	14V	0V
Q609	0V	14V	0V
Q610	14V	0V	14V
Q801	0V	14V	0V
Q625	0V	5V	0V
Q616 ≀ Q619	14V	0V	14V
Q611	0V	0V	5V
Q708	0V	0V	0V
Q703	0V	8V	0V
Q704	0V	14V	0V
Q101	5V	14V	5.6V

CB501

		MODE
1	0V	
2	5V	0V at no record
3	5V	
4	5V	
5	0V	
6	PULSE	
7	5V	
8	CLOCK	
9	5V	
10	5V	FF/REW 0V
11	5V	
12	5V	REW 0V
13	0V	
14	5V	0V at no record
15	0V	
16	5V	

CB502

1	2.2V
2	2V
3	0V
4	4.4V
5	0V
6	CLOCK
7	0V
8	CLOCK
9	0V
10	CLOCK
11	CLOCK
12	5V

CB6103

1	5V
2	0V
3	0V
4	0V
5	2.2V
6	1.8V
7	CLOCK
8	CLOCK
9	CLOCK
10	CLOCK
11	5V
12	CLOCK
13	PULSE
14	CLOCK
15	CLOCK
16	CLOCK
17	CLOCK
18	0V
19	CLOCK
20	0V

CB703

1	9V
2	5V
3	0V
4	PULSE 0V/5V
5	PULSE 0V/5V
6	0V
7	0V
8	0V

IC302

1	5V
2	5V
3	5V
4	
5	5V
6	5V
7	5V
8	5V
9	5V
10	5V
11	
12	5V
13	5V
14	5V

CB704

1	2V
2	2.2V
3	0V
4	0V
5	2.4V
6	PULSE
7	2.5V (PULSE)
8	4.2V

CH851

1	14V
2	0V
3	0V

CB901

1	5V
2	5V
3	5V
4	5V
5	5V
6	5V
7	0V
8	5V
9	5V
10	5V
11	5V
12	5V
13	5V

IC303, 304

1	5V	5	5V
2	5V	6	5V
3	5V	7	5V
4	0V	8	10V

WP902

1	0V	13	12.6V
2	14V	14	12.7V
3	14V	15	11.9V
4		16	12.6V
5	0V	17	CLOCK
6	0V	18	CLOCK
7	0V	19	CLOCK
8	0V	20	CLOCK
9	0V	21	CLOCK
10	0V	22	5V
11	2.58V	23	11.6V
12	2.58V	24	0V

IC603

1	0V	5	0V
2	0V	6	5V
3	0V	7	0V
4	0V	8	5V

IC701, 702

1	0V	6	0V
2	0.56V	7	8.3V
3	0.86V	8	8.3V
4	0.36V	9	0.9V
5	0V	10	0.5V

CB401

1	0V/5V	
2	By the tape	5V with 32KHz sampling tape 0V for others.
3	2.2V(CLOCK)	
4	CLOCK	
5	NC	
6	NC	
7	CLOCK	
8	CLOCK	
9	0V	
10	CLOCK	

CB402

1	14V
2	5V
3	0V
4	5V
5	-5V
6	+5V

CB6101

1	0V
2	CLOCK
3	5V
4	5V
5	0V
6	-5V

※For IC603 use one supplied from Alpine only.

[Measuring Conditions]
1. Power Supply Voltage : DC 14.4V
2. Measuring Meter : Digital Multi Voltmeter
3. Measuring Point Reference : Between Ground
4. Measuring Condition : No Signal Input
DAT Deck In Play Conditions

NOTES:

1. All resistance values are in ohms. K = 1,000
2. All capacitance values are in microfarads. $P = \frac{1}{1,000,000}$

Electrical Parts List

Resistor : Carbon resistors under 1/4 watts are not mentioned in the parts list, please confirm them by schematic diagram.
uF=microfarads, pF=picofarads

Abbreviations

RES.=Resistor
CAP.=Capacitor
C.F.=Carbon Film
ELY.=Electrolytic
M.F.=Metal Film
CER.=Ceramic
M.O.=Metal Oxide Film
MYL.=Mylar
M.P.=Metal Plate
TAN.=Tantalum
TR.=Transistor
POLY.=Polystyrol
TRANS.=Transformer
PP.=Polypropylene
CP.=Chip
PLT.=Polyethylene

Symbol No.	Part No.	Description		
RF P. C. Board				
IC/Coils/Transistors				
IC101	51T90268F01	CX1045Q		
L101	91T93280F01	Filter, ZJS5101		
L102	24T93279F35	Coil, EL0304 150 µ H		
L103	24T93279F35	Coil, EL0304 150 µ H		
Q150	48T63417F01	TR., CP., 2SC2412K		
Q151	48T63417F01	TR., CP., 2SC2412K		
Q152	48T63417F01	TR., CP., 2SC2412K		
Capacitors				
C103	08S65128F51	CP., 470pF		
C104	08S65128F51	CP., 470pF		
C105	08S65128F51	CP., 470pF		
C106	08S65128F74	CP., 0.047 µ F		
C107	08S65128F74	CP., 0.047 µ F		
C108	08S65128F69	CP., 0.01 µ F		
C109	23T74181F12	CP., T.T. 1 µ F/16V		
C110	08S65128F69	CP., 0.01 µ F		
C111	08S53332F57	CP., 0.1 µ F		
C112	08T83976F01	CP., 0.1 µ F		
C113	08S65128F74	CP., 0.047 µ F		
C114	08S53332F57	CP., 0.1 µ F		
C115	08S65128F69	CP., 0.01 µ F		
C116	08S65128F69	CP., 0.01 µ F		
C117	08S53332F57	CP., 0.1 µ F		
C118	08S65128F74	CP., 0.047 µ F		
C119	08T83976F01	CP., 0.1 µ F		
C120	08S53332F57	CP., 0.1 µ F		
C121	08S65128F51	CP., 470pF		
C122	23T74436F34	TAN., 22 µ F/16V		
C124	23T74436F34	TAN., 22 µ F/16V		
C126	08S53332F57	CP., 0.1 µ F		
C127	08S53332F57	CP., 0.1 µ F		
C128	08S53332F57	CP., 0.1 µ F		
C129	08S53332F57	CP., 0.1 µ F		

NOTE : ★IC603 : Use the one supplied from Alpine.

Symbol No.	Part No.	Description		
C140	08S53332F35	CP., 1000pF		
C141	23T74181F12	CP., T.T., 1 µ F/16V		
Resistors (All resistors are chip 1/16W±5% unless otherwise noted.)				
R102	06S64995F92	43k ohm		
R103	06S64995F77	10k ohm		
R104	06S64995F88	30k ohm		
R105	06S64995F69	4.7k ohm		
R106	06S64995F77	10k ohm		
R107	06S64995F77	10k ohm		
R108	06S64995F83	18k ohm		
R109	06S64995F85	22k ohm		
R110	06S64995F85	22k ohm		
R111	06S64995F83	18k ohm		
R112	06S64995F85	22k ohm		
R113	06S64995F85	22k ohm		
R120	06S64995F53	1k ohm		
R121	06S64995F53	1k ohm		
R122	06S64995F65	3.3k ohm		
R123	06S64995F65	3.3k ohm		
R124	06S64995F57	1.5k ohm		
R125	06S64995F47	560k ohm		
R126	06S64995F77	10k ohm		
R127	06S64995F81	15k ohm		
VR101	18T95183F08	CP., RH04AVC 47k ohmB		
VR102	18T95183F09	CP., RH04AVC 100k ohmB		
VR103	18T95183F09	CP., RH04AVC 100k ohmB		
Main P. C. Board				
IC's				
IC301	51T92001F01	BA4560F		
IC302	51T93340F01	NJM2060		
IC303	51T93335F01	NJM5532M		
IC304	51T92001F01	BA4560F		
IC601	51T84007F10	84007F10		
IC602	51T83388F07	83388F07		
★IC603	51T83402F01	ER59256GI		
IC604	51T90277F01	HD74HC00FP		
IC605	51T90277F04	HD74HC74FP		
IC606	51T83980F01	µ PC393G		

Symbol No.	Part No.	Description		
IC607	51T83980F01	μ PC393G		
IC608	51T50834F02	μ PC7805		
IC609	51T96065F01	M51957BFP		
IC701	51T90256F01	BA6209		
IC702	51T90256F01	BA6209		
IC1001	51T90890F01	M5236ML		
IC1002	51T90890F01	M5236ML		
Transistors				
Q101	48T80615F01	CP., 2SD1766		
Q301	48T72751F01	2SD1227		
Q302	48T62967F03	CP., DTC124K		
Q303	48T63417F01	CP., 2SC2412K		
Q304	48T57337F02	2SD1330		
Q305	48T57337F02	2SD1330		
Q306	48T57337F02	2SD1330		
Q307	48T57337F02	2SD1330		
Q308	48T63788F01	CP., 2SD1328		
Q601	48T62967F03	CP., DTC124K		
Q602	48T62967F03	CP., DTC124K		
Q603	48T62967F03	CP., DTC124K		
Q604	48T62967F03	CP., DTC124K		
Q606	48T62967F03	CP., DTC124K		
Q607	48T62967F03	CP., DTC124K		
Q608	48T80615F01	CP., 2SD1766		
Q609	48T63417F01	CP., 2SC2412K		
Q610	48T62966F02	CP., DTA114		
Q612	48T62967F03	CP., DTC124K		
Q613	48T73888F08	CP., FMG1		
Q614	48T73888F08	CP., FMG1		
Q615	48T73888F08	CP., FMG1		
Q616	48T70213F01	2SB911M		
Q617	48T70213F01	2SB911M		
Q618	48T70213F01	2SB911M		
Q619	48T70213F01	2SB911M		
Q620	48T73888F03	CP., FMW1		
Q621	48T63417F01	CP., 2SC2412K		
Q622	48T63417F01	CP., 2SC2412K		
Q623	48T70213F01	2SB911M		
Q624	48T62967F03	CP., DTC124K		
Q625	48T62967F03	CP., DTC124K		
Q626	48T62967F02	CP., DTC114K		
Q627	48T62967F02	CP., DTC114K		
Q656	48T62967F03	CP., DTC124K		
Q657	48T62967F21	CP., DTC124TK		
Q658	48T62967F03	CP., DTC124K		
Q659	48T62966F03	CP., DTA124		
Q660	48T62967F03	CP., DTC124K		
Q703	48T62967F03	CP., DTC124K		

Symbol No.	Part No.	Description		
Q704	48T61226F01	2SD1251		
Q708	48T81552F01	CP., 2SD1383K		
Q801	48T62967F03	CP., DTC124K		
Q1001	48T70213F01	2SB911M		
Q1002	48T56030F03	2SB941		
Diodes				
D301	48C40235G02	10E2		
D302	48C40235G02	10E2		
D602	48T52446F01	CP., MA151WK		
D603	48T52445F01	CP., MA151WA		
D605	48T52446F01	CP., MA151WK		
D606	48T52446F01	CP., MA151WK		
D701	48T84052F01	11ES2		
D702	48T90681F01	CP., MA110		
D802	48C40235G02	10E2		
D803	48C40235G02	10E2		
D804	48C40235G02	10E2		
D805	48C40235G02	10E2		
D806	48C40235G02	10E2		
D807	48T84052F01	11ES2		
D808	48C40235G02	10E2		
ZD101	48T68697F22	Zener, HZS5.6EB3		
ZD301	48T68697F37	Zener, HZS9.1EB3		
ZD302	48T68697F45	Zener, HZS12EB1		
ZD602	48T83128F04	Zener, HZS6B1L		
ZD603	48T68697F19	Zener, HZS5.1EB3		
ZD604	48T68697F22	Zener, HZS5.6EB3		
ZD605	48T68697F47	Zener, HZS12EB3		
ZD606	48T68697F19	Zener, HZS5.1EB3		
ZD607	48T68697F19	Zener, HZS5.1EB3		
ZD608	48T68697F25	Zener, HZS6.2EB3		
ZD702	48T68697F29	Zener, HZS7.5EB1		
ZD704	48T68697F29	Zener, HZS7.5EB1		
Coil/Relays/Switch/Crystals				
L801	24T70709F01	Coil, 47 μ H		
RL301	80T90324F01	Relay, ATQ203		
RL302	80T90324F01	Relay, ATQ203		
RL801	80T67174F01	Relay, G6B (12V)		
S301	40T68057F01	Switch, SSJ-342 (LINE/TUNER)		
X601	48T93467F02	Crystal, FAR、CASB 8.0MHz		
X602	48T93467F01	Crystal, FAR、CASA 4.0MHz		

Symbol No.	Part No.	Description		
Capacitors				
C101	23S61523F29	ELY., 1 μ F/50V		
C102	08S53332F57	CP., 0.1 μ F		
C301	08T57705F81	MYL., 0.15 μ F		
C302	08T57705F81	MYL., 0.15 μ F		
C303	08T92719F14	QP 750pF		
C304	08T92719F14	QP 750pF		
C305	08T57705F72	MYL., 0.027 μ F		
C306	08T57705F72	MYL., 0.027 μ F		
C307	08T92719F01	QP 100pF		
C308	08T92719F01	QP 100pF		
C309	08T72783F14	CP., 18pF		
C310	08T72783F14	CP., 18pF		
C311	23T90689F68	ELY., 10 μ F/50V		
C312	23T90689F68	ELY., 10 μ F/50V		
C313	23T90689F68	ELY., 10 μ F/50V		
C314	23T90689F68	ELY., 10 μ F/50V		
C315	23T00133L31	ELY., 10 μ F/50V		
C316	23T90689F68	ELY., 10 μ F/50V		
C317	23T90689F68	ELY., 10 μ F/50V		
C318	23T00133L31	ELY., 10 μ F/50V		
C319	23T00133L31	ELY., 10 μ F/50V		
C320	23T00133L02	ELY., 22 μ F/16V		
C321	23T00133L31	ELY., 10 μ F/50V		
C322	23T00134L17	ELY., 100 μ F/10V		
C324	23T00133L31	ELY., 10 μ F/50V		
C325	23T00133L31	ELY., 10 μ F/50V		
C326	23S61523F12	ELY., 10 μ F/16V		
C327	23S61523F12	ELY., 10 μ F/16V		
C328	23S61523F12	ELY., 10 μ F/16V		
C329	23S61523F12	ELY., 10 μ F/16V		
C330	23S61523F12	ELY., 10 μ F/16V		
C332	08T72783F06	CP., 5pF		
C333	08T72783F06	CP., 5pF		
C601	23S61523F27	ELY., 0.33 μ F/50V		
C602	08S53332F57	CP., 0.1 μ F		
C605	08S53332F57	CP., 0.1 μ F		
C606	23S57422F16	ELY., 100 μ F/6.3V		
C607	08S65128F07	CP., 5pF		
C608	23S61523F30	ELY., 2.2 μ F/50V		
C609	23S61523F31	ELY., 3.3 μ F/50V		
C610	08S65128F57	CP., 1000pF		
C611	23S61523F12	ELY., 10 μ F/16V		
C612	08S65128F57	CP., 1000pF		
C613	23S61523F12	ELY., 10 μ F/16V		
C614	08S65128F69	CP., 0.01 μ F		
C617	23S61523F29	ELY., 1 μ F/50V		
C618	23S57422F05	ELY., 1 μ F/50V		
C619	23S57422F05	ELY., 1 μ F/50V		
C620	23S57422F06	ELY., 2.2 μ F/50V		
C621	23S57422F14	ELY., 47 μ F/6.3V		
C622	23S57422F11	ELY., 22 μ F/16V		
C623	23S61523F07	ELY., 47 μ F/6.3V		
C656	23S61523F08	ELY., 100 μ F/6.3V		
C697	08S53332F57	CP., 0.1 μ F		
C698	23T62939F02	ELY., 0.047 μ F/5.5V		
C699	23S61523F15	ELY., 47 μ F/16V		
C707	08S65128F69	CP., 0.01 μ F		
C708	08S65128F69	CP., 0.01 μ F		
C710	23S61523F12	ELY., 10 μ F/16V		
C711	23T73862F01	ELY., 100 μ F/10V		
C801	23T00134L36	ELY., 1000 μ F/16V		
C802	23T00132L02	ELY., 220 μ F/16V		
C803	23T00134L36	ELY., 1000 μ F/16V		
C1001	08S65128F57	CP., 1000pF		
C1002	08S65128F57	CP., 1000pF		
C1004	23S61523F09	ELY., 22 μ F/10V		
C1005	23T82482F02	ELY., 100 μ F/16V		
Resistors (All resistors are chip 1/16W±5% unless otherwise noted.)				
R101	06S64995F53	1k ohm		
R301	06S53330F79	12k ohm 1/8W		
R302	06S53330F79	12k ohm 1/8W		
R303	06S53330F79	12k ohm 1/8W		
R304	06S53330F79	12k ohm 1/8W		
R305	06S53330F77	10k ohm 1/8W		
R306	06S53330F77	10k ohm 1/8W		
R307	06S53330F77	10k ohm 1/8W		
R308	06S53330F77	10k ohm 1/8W		
R309	06S53330F91	39k ohm 1/8W		
R310	06S53330F91	39k ohm 1/8W		
R311	06S53331F26	1M ohm 1/8W		
R312	06S53331F26	1M ohm 1/8W		
R313	06S53330F23	56 ohm 1/8W		
R314	06S53330F77	10k ohm 1/8W		
R315	06S53330F77	10k ohm 1/8W		
R318	06S53330F25	68 ohm 1/8W		
R321	06S53330F37	220 ohm 1/8W		
R322	06S53330F37	220 ohm 1/8W		
R323	06S53330F37	220 ohm 1/8W		
R324	06S53330F37	220 ohm 1/8W		
R329	06S53330F29	100 ohm 1/8W		
R330	06S53330F29	100 ohm 1/8W		
R331	06S53330F29	100 ohm 1/8W		
R332	06S53330F29	100 ohm 1/8W		
R333	06S64995F77	10k ohm		
R334	06S64995F77	10k ohm		
R335	06S64995F77	10k ohm		
R336	06S64995F77	10k ohm		
R337	06S64995F70	5.1k ohm		

Symbol No.	Part No.	Description		
R338	06S64995F70	5.1k ohm		
R339	06S64995F70	5.1k ohm		
R340	06S64995F70	5.1k ohm		
R341	06S64995F70	5.1k ohm		
R342	06S64995F70	5.1k ohm		
R343	06S64995F70	5.1k ohm		
R344	06S64995F70	5.1k ohm		
R345	06S64995F95	56k ohm		
R346	06S64995F95	56k ohm		
R349	06S64995F87	27k ohm		
R350	06S64995F87	27k ohm		
R351	06T70072F45	470 ohm 1/4W		
R352	06S53331F02	100k ohm 1/8W		
R353	06S53331F02	100k ohm 1/8W		
R354	06S53330F77	10k ohm 1/8W		
R355	06S53330F77	10k ohm 1/8W		
R356	06S53330F65	3.3k ohm 1/8W		
R357	06S53330F65	3.3k ohm 1/8W		
R358	06S64995F85	22k ohm		
R359	06S53330F53	1k ohm 1/8W		
R360	06S64995F29	100 ohm		
R601	06T70072F49	680 ohm 1/4W		
R602	06T70072F49	680 ohm 1/4W		
R603	06T70072F49	680 ohm 1/4W		
R604	06S64996F02	100k ohm		
R605	06S64996F02	100k ohm		
R606	06S53331F02	100k ohm 1/8W		
R607	06S53331F02	100k ohm 1/8W		
R608	06S53331F02	100k ohm 1/8W		
R609	06S64995F85	22k ohm		
R612	06S64996F02	100k ohm		
R613	06S64996F02	100k ohm		
R614	06S64996F02	100k ohm		
R615	06S64996F02	100k ohm		
R616	06S64996F02	100k ohm		
R617	06T70072F53	1k ohm 1/4W		
R618	06S64995F77	10k ohm		
R620	06S64995F77	10k ohm		
R621	06S64995F85	22k ohm		
R622	06S64995F85	22k ohm		
R624	06S64995F77	10k ohm		
R625	06S64995F77	10k ohm		
R626	06S64996F02	100k ohm		
R627	06S64996F02	100k ohm		
R628	06S64995F69	4.7k ohm		
R629	06S64995F77	10k ohm		
R630	06S64995F85	22k ohm		
R631	06S64996F18	470k ohm		
R632	06S64995F77	10k ohm		
R633	06S64995F77	10k ohm		

Symbol No.	Part No.	Description		
R634	06S53330F77	10k ohm 1/8W		
R635	06S64995F77	10k ohm		
R636	06S64995F69	4.7k ohm		
R637	06S64995F77	10k ohm		
R638	06S64995F85	22k ohm		
R639	06S64996F18	470k ohm		
R640	06S64995F68	4.3k ohm		
R641	06S64995F51	820 ohm		
R642	06S64995F88	30k ohm		
R643	06S64996F04	120k ohm		
R644	06S64995F78	11k ohm		
R645	06S64995F85	22k ohm		
R646	06S64996F20	560k ohm		
R648	06S53330F77	10k ohm 1/8W		
R649	06S64995F77	10k ohm		
R650	06T70072F61	2.2k ohm 1/4W		
R651	06S64995F77	10k ohm		
R652	06T70072F61	2.2k ohm 1/4W		
R653	06S64995F77	10k ohm		
R654	06S53330F69	4.7k ohm 1/8W		
R655	06T70072F51	820 ohm 1/4W		
R656	06T70072F29	100 ohm 1/4W		
R657	06T70072F29	100 ohm 1/4W		
R658	06T70072F29	100 ohm 1/4W		
R659	06S64995F77	10k ohm		
R660	06T70072F61	2.2k ohm 1/4W		
R661	06S64995F69	4.7k ohm		
R662	06S64995F69	4.7k ohm		
R663	06S64995F77	10k ohm		
R664	06T70072F61	2.2k ohm 1/4W		
R665	06T70072F29	100 ohm 1/4W		
R666	06T70072F29	100 ohm 1/4W		
R667	06T70072F29	100 ohm 1/4W		
R668	06S53330F77	10k ohm 1/8W		
R669	06S64995F93	47k ohm		
R670	06S64996F04	120k ohm		
R671	06S64996F02	100k ohm		
R672	06S64995F71	5.6k ohm		
R673	06S64996F04	120k ohm		
R674	06S64996F02	100k ohm		
R675	06S64996F02	100k ohm		
R676	06T70072F45	470 ohm 1/4W		
R677	06S64995F77	10k ohm		
R678	06S64995F85	22k ohm		
R679	06S64995F85	22k ohm		
R680	06S64995F85	22k ohm		
R681	06S64996F02	100k ohm		
R682	06S64995F77	10k ohm		
R683	06S64996F02	100k ohm		
R684	06S64996F02	100k ohm		

Symbol No.	Part No.	Description		
R702	06T70072F01	4.7 ohm 1/4W		
R703	06T70072F01	4.7 ohm 1/4W		
R704	06T70072F01	4.7 ohm 1/4W		
R705	06T70072F01	4.7 ohm 1/4W		
R708	06S64995F37	220 ohm		
R709	06S64995F77	10k ohm		
R710	06S64996F18	470k ohm		
R711	06S53330F83	18k ohm 1/8W		
R712	06S53331F02	100k ohm 1/8W		
R1001	06S64995F37	220 ohm		
R1002	06S64995F37	220 ohm		
R1003	06S64995F68	4.3k ohm		
R1004	06S64995F68	4.3k ohm		
R1005	06S64995F80	13k ohm		
R1006	06S64995F81	15k ohm		
R1007	06S64995F81	15k ohm		
R1008	06S64995F86	24k ohm		
VR301	18T90945F01	Volume Control (VOLUME, BALANCE, FADER)		
DAC P. C. Board				
IC's				
IC401	51T92768F01	HD49202		
IC402	51T80318F01	PCM56JP		
IC403	51T91080F01	μ PD4053BG		
IC404	51T93337F01	NJM4560M		
IC405	51T93337F01	NJM4560M		
IC406	51T92770F01	WLP22D5B8		
IC407	51T93337F01	NJM4560M		
IC408	51T93337F01	NJM4560M		
IC409	51T90277F07	HD74HC04FP		
IC410	51T90277F04	HD74HC74FP		
IC411	51T90277F06	HD74HC161FP		
IC412	51T90277F02	HD74HC08FP		
IC413	51T90890F01	M5236ML		
IC414	51T92806F01	NJM78L05UA		
Transistors/Crystal				
Q401	48T62967F03	CP., DTC124K		
Q402	48T62967F03	CP., DTC124K		
Q403	48T62967F03	CP., DTC124K		
Q404	48T70213F01	2SB911M		
X401	48T93827F01	Crystal, AT-51 19.35MHz		
or	48T84043F06	Crystal, HC-49 19.35MHz		

Symbol No.	Part No.	Description		
Capacitors				
C401	08T00151L12	P.P., 820pF		
C402	08T00151L12	P.P., 820pF		
C403	08T92719F07	QP., 30pF		
C404	08T92719F07	QP., 330pF		
C405	23T00133L31	ELY., 10 μ F/50V		
C406	23T00133L31	ELY., 10 μ F/50V		
C407	23S61523F34	ELY., 100 μ F/10V		
C408	23S61523F34	ELY., 100 μ F/10V		
C409	08T80227F13	PF 0.01 μ F		
C410	08T80227F13	PF 0.01 μ F		
C411	08S53332F57	CP., 0.1 μ F		
C412	08S53332F57	CP., 0.1 μ F		
C414	08S65128F72	CP., 0.022 μ F		
C415	23S61523F34	ELY., 100 μ F/10V		
C416	23S61523F34	ELY., 100 μ F/10V		
C417	23S61523F34	ELY., 100 μ F/10V		
C418	23S61523F34	ELY., 100 μ F/10V		
C419	08S65128F76	CP., 0.1 μ F		
C420	08S53332F57	CP., 0.1 μ F		
C421	08S53332F57	CP., 0.1 μ F		
C422	08S65128F69	CP., 0.01 μ F		
C423	08S65128F69	CP., 0.01 μ F		
C424	08S65128F69	CP., 0.01 μ F		
C425	08S65128F69	CP., 0.01 μ F		
C426	08S65128F69	CP., 0.01 μ F		
C427	23T43247F22	ELY., 100 μ F/16V		
C430	08S65128F09	CP., 7pF		
C431	08S65128F09	CP., 7pF		
C432	08S65128F69	CP., 0.01 μ F		
C433	08S53332F57	CP., 0.1 μ F		
C434	08S65128F76	CP., 0.1 μ F		
Resistors (All resistors are chip 1/16W±5% unless otherwise noted.)				
R401	06S64995F64	3k ohm		
R402	06S64995F64	3k ohm		
R403	06S64995F54	1.1k ohm		
R404	06S64995F54	1.1k ohm		
R405	06S64995F88	30k ohm		
R406	06S64995F88	30k ohm		
R407	06S64996F02	100k ohm		
R408	06S64996F02	100k ohm		
R409	06S64996F02	100k ohm		
R410	06S64996F02	100k ohm		
R411	06S64995F71	5.6k ohm		
R412	06S64995F71	5.6k ohm		
R413	06S64995F57	1.5k ohm		
R414	06S64995F57	1.5k ohm		
R415	06S64996F18	470k ohm		

Symbol No.	Part No.	Description		
R416	06S64996F18	470k ohm		
R417	06S64996F08	180k ohm		
R418	06S64996F17	430k ohm		
R419	06S64996F26	1M ohm		
R420	06S64996F26	1M ohm		
R421	06S64995F37	220 ohm		
R422	06S64995F81	15k ohm		
R423	06S64995F87	27k ohm		
R424	06S64995F68	4.3k ohm		
VR401	18T69291F02	Variable, H0522A 100k ohmB		
Servo P. C. Board				
IC's				
IC501	51T84011F01	CXD1052Q		
IC502	51T84008F01	CXA1046		
IC503	51T84031F01	LC7990		
IC504	51T90267F01	μ PD4538G		
IC505	51T83979F01	μ PC324G		
IC506	51T83979F01	μ PC324G		
IC507	51T83979F01	μ PC324G		
Transistors				
Q501	48T62967F03	CP., DTC124K		
Q502	48T62967F03	CP., DTC124K		
Q503	48T62967F03	CP., DTC124K		
Q504	48T52443F14	FET, CP., 2SK198		
Q505	48T62967F03	CP., DTC124K		
Diodes				
D501	48T64134F01	CP., DA204K		
ZD501	48T62636F03	Zener, HZ2CLL		
ZD502	48T62636F06	Zener, HZ3CLL		
ZD503	48T62636F06	Zener, HZ3CLL		
Crystal				
X501 or	48T93791F01 48T84043F01	AT−51 4.0MHz HC−49 4.0MHz		

Symbol No.	Part No.	Description		
Capacitors				
C501	23T41366F08	ELY., (B.P.) 22 μ F/10V		
C502	08T90316F29	TF, 0.1 μ F		
C503	23S57422F09	ELY., 10 μ F/16V		
C504	23S61523F12	ELY., 10 μ F/16V		
C505	08S53332F57	CP., 0.1 μ F		
C506	08S53332F57	CP., 0.1 μ F		
C507	08S53332F51	CP., 0.022 μ F		
C508	23T41366F08	ELY., (B.P.) 22 μ F/10V		
C509	08S53332F57	CP., 0.1 μ F		
C510	23S61523F12	ELY., 10 μ F/16V		
C511	23S61523F29	ELY., 1 μ F/50V		
C512	08S65128F69	CP., 0.01 μ F		
C513	08S65128F21	CP., 27pF		
C514	08S65128F21	CP., 27pF		
C515	08S65128F71	CP., 0.015 μ F		
C516	23S61523F29	ELY., 1 μ F/50V		
C517	08S65128F72	CP., 0.022 μ F		
C518	08S65128F72	CP., 0.022 μ F		
C519	08S65128F69	CP., 0.01 μ F		
C520	08S65128F69	CP., 0.01 μ F		
C521	23T74181F11	CP., T.T., 1 μ F/10V		
C522	08S65128F61	CP., 2200pF		
C523	23T74181F38	CP., T.T., 10 μ F/10V		
C524	08S65128F65	CP., 4700pF		
C525	08S65128F57	CP., 1000pF		
C526	08S65128F69	CP., 0.01 μ F		
C527	08S65128F69	CP., 0.01 μ F		
C528	08S65128F57	CP., 1000pF		
C529	08S53332F57	CP., 0.1 μ F		
C530	08S53332F57	CP., 0.1 μ F		
C531	08S53332F57	CP., 0.1 μ F		
Resistors (All resistors are chip 1/16W±5% unless otherwise noted.)				
R501	06S64995F77	10k ohm		
R502	06S64996F06	150k ohm		
R503	06S64995F77	10k ohm		
R505	06S64995F77	10k ohm		
R506	06S64995F93	47k ohm		
R507	06S64995F81	15k ohm		
R508	06S64995F45	470 ohm		
R509	06S64995F85	22k ohm		
R510	06S64995F85	22k ohm		
R511	06S64996F10	220k ohm		

Symbol No.	Part No.	Description		
R512	06S64995F89	33k ohm		
R513	06S64996F02	100k ohm		
R514	06S64995F97	68k ohm		
R515	06S64995F97	68k ohm		
R516	06S64995F89	33k ohm		
R517	06S64995F85	22k ohm		
R518	06S64995F77	10k ohm		
R519	06S64995F95	56k ohm		
R520	06S64995F45	470 ohm		
R521	06S64995F81	15k ohm		
R522	06S64995F85	22k ohm		
R523	06S64996F02	100k ohm		
R524	06S64995F77	10k ohm		
R525	06S64995F77	10k ohm		
R526	06S64995F65	3.3k ohm		
R527	06S64996F26	1M ohm		
R528	06S64995F63	2.7k ohm		
R529	06S64995F45	470 ohm		
R530	06S64995F87	27k ohm		
R531	06S64995F71	5.6k ohm		
R532	06S64995F87	27k ohm		
R533	06S64995F81	15k ohm		
R536	06S64995F81	15k ohm		
R537	06S64996F02	100k ohm		
R538	06S64996F26	1M ohm		
R539	06S64995F29	100 ohm		
R540	06S64995F53	1k ohm		
R541	06S64995F53	1k ohm		
VR501	18T69291F26	Variable, H0522A 4.7k ohmB		
VR502	18T69291F04	Variable, H0522A 22k ohmB		
VR503	18T69291F02	Variable, H0522A 100k ohmB		
VR504	18T69291F24	Variable, H0522A 2.2k ohmB		
VR505	18T69291F24	Variable, H0522A 2.2k ohmB		
VR506	18T69291F04	Variable, H0522A 22k ohmB		

Driver P. C. Board

IC's/Transistor

IC703	51T90259F01	HA13403V		
IC704	51T90259F01	HA13403V		
IC705	51T52154F01	NJM2901N		
IC706	51T90261F01	BA6305		
Q710	48T62966F09	CP., DTA114T		

Capacitors

Symbol No.	Part No.	Description		
C710	23S61523F29	ELY., 1 μF/50V		
C711	23S61523F34	ELY., 100 μF/10V		
C712	23S61523F34	ELY., 100 μF/10V		
C713	23S61523F34	ELY., 100 μF/10V		
C714	08S65128F65	CP., 4700pF		
C715	08S65128F65	CP., 4700pF		
C716	08S65128F65	CP., 4700pF		
C717	23S92017F01	ELY., 220 μF/10V		
C718	08S65128F69	CP., 0.01 μF		
C719	23S61523F12	ELY., 10 μF/16V		
C720	08S65128F69	CP., 0.01 μF		
C721	23S61523F17	ELY., 4.7 μF/25V		
C722	23S61523F07	ELY., 47 μF/6.3V		
C723	23S61523F10	ELY., 33 μF/10V		
C724	23S61523F10	ELY., 33 μF/10V		
C725	23S57422F12	ELY., 33 μF/10V		
C726	08S65128F65	CP., 4700pF		
C727	08S65128F65	CP., 4700pF		
C728	08S65128F65	CP., 4700pF		
C729	23S61523F29	ELY., 1 μF/50V		
C730	23T65374F08	ELY., 470 μF/10V		
C731	08S65128F69	CP., 0.01 μF		
C732	23S61523F12	ELY., 10 μF/16V		
C733	08S65128F69	CP., 0.01 μF		
C734	23S61523F25	ELY., 0.1 μF/50V		
C735	23S61523F05	ELY., 22 μF/6.3V		
C736	23S61523F29	ELY., 1 μF/50V		
C737	08S65128F69	CP., 0.01 μF		
C738	08S65128F74	CP., 0.047 μF		
C739	08S65128F74	CP., 0.047 μF		
C740	08S65128F74	CP., 0.047 μF		
C741	08S65128F74	CP., 0.047 μF		
C742	23S61523F29	ELY., 1 μF/50V		
C743	23S61523F29	ELY., 1 μF/50V		
C744	08S65128F71	CP., 0.015 μF		
C745	08S65128F69	CP., 0.01 μF		
C746	23S61523F29	ELY., 1 μF/50V		

Resistors (All resistors are chip 1/16W±5% unless otherwise noted.)

R709	06S64995F45	470 ohm		
R710	06S64995F45	470 ohm		
R711	06T70072F78	2.2 ohm 1/4W		
R712	06T70072F78	2.2 ohm 1/4W		
R713	06T70072F78	2.2 ohm 1/4W		

Symbol No.	Part No.	Description		
R714	06T70072F80	2.7 ohm 1/4W		
R715	06S64995F71	5.6k ohm		
R716	06S64995F71	5.6k ohm		
R717	06S64995F29	100 ohm		
R718	06S64995F56	1.3k ohm		
R719	06S64995F77	10k ohm		
R720	06T70072F84	3.9 ohm 1/4W		
R721	06T70072F84	3.9 ohm 1/4W		
R722	06T70072F84	3.9 ohm 1/4W		
R723	06T70072F84	3.9 ohm 1/4W		
R724	06S64995F45	470 ohm		
R725	06S64995F45	470 ohm		
R726	06S64995F45	470 ohm		
R727	06T70072F78	2.2 ohm 1/4W		
R728	06T70072F78	2.2 ohm 1/4W		
R729	06T70072F78	2.2 ohm 1/4W		
R730	06S64995F69	4.7k ohm		
R731	06T70072F80	2.7 ohm 1/4W		
R732	06S64995F60	2k ohm		
R733	06S64995F65	3.3k ohm		
R734	06S64995F45	470 ohm		
R735	06S64995F77	10k ohm		
R736	06S64995F79	12k ohm		
R737	06S64995F77	10k ohm		
R738	06S64995F45	470 ohm		
R739	06S64995F45	470 ohm		
R740	06S64995F45	470 ohm		
R741	06T70072F84	3.9 ohm 1/4W		
R742	06T70072F84	3.9 ohm 1/4W		
R743	06T70072F84	3.9 ohm 1/4W		
R744	06T70072F84	3.9 ohm 1/4W		
R745	06S64995F93	47k ohm		
R746	06S64995F77	10k ohm		
R747	06S64996F02	100k ohm		
R748	06S64996F02	100k ohm		
R749	06S64996F18	470k ohm		
R750	06S64996F10	220k ohm		
R751	06S64996F10	220k ohm		
R752	06S64996F18	470k ohm		
R753	06T83507F01	Block, 10k ohm x 4		
R757	06S64995F53	1k ohm		
R758	06S64996F11	240k ohm		
R759	06S64995F77	10k ohm		
R760	06S64995F53	1k ohm		
R761	06S64995F77	10k ohm		
R762	06S64996F20	560k ohm		
R763	06S64996F11	240k ohm		

Symbol No.	Part No.	Description		
D/D Converter P. C. Board				
IC's/Transistors				
IC851	51T92806F01	NJM78L05UA		
IC852	51T92807F01	NJM79L05UA		
Q851	48T62967F23	TR., CP., DTC143TK		
Q852	48T52549F02	TR., 2SD973A		
Diodes				
D851	48T68828F01	1SS133		
D852	48T68828F01	1SS133		
D853	48T64134F01	CP., DA204K		
ZD851	48T62934F40	CP., Zener, RD10MB2		
ZD852	48T68697F91	Zener, HZS39EB4		
or	48T90517F95	Zener, HZS39NB4		
Coils/Transformer				
L851	24T51656F26	Inductor, 22 μH		
L852	24T51656F26	Inductor, 22 μH		
L853	24T70709F01	Coil, 47 μH		
L855	24T93279F25	Coil EL0304 22 μH		
L856	24T93279F25	Coil, EL0304 22 μH		
T851	25T91091F01	TRANS., Coil, D/D Converter		
Capacitors				
C851	23S61523F09	ELY., 22 μF/10V		
C852	23S57422F11	ELY., 22 μF/16V		
C853	23S61523F09	ELY., 22 μF/10V		
C854	23S61523F09	ELY., 22 μF/10V		
C855	23S61523F34	ELY., 100 μF/10V		
C856	23T43247F21	ELY., 100 μF/10V		
C857	23C44780P22	ELY., 100 μF/16V		
C858	08S65128F67	CP., 6800pF		
C859	08S65128F63	CP., 3300pF		
C860	08S65128F74	CP., 0.047 μF		

Symbol No.	Part No.	Description		
Resistors				
R851	06S64995F25	68 ohm		
R852	06S64996F02	100k ohm		
R853	06S64995F21	47 ohm		
R854	06S64995F37	220 ohm		
R855	06S64995F29	100 ohm		
R856	06S64995F53	1k ohm		
Front P. C. Board				
IC's				
IC901	51T65476F02	μ PD6320GC		
IC902	51T65476F02	μ PD6320GC		
Diodes				
D901	48T52445F01	CP., MA151WA		
D902	48T52445F01	CP., MA151WA		
D903	48T52445F01	CP., MA151WA		
D904	48T52446F01	CP., MA151WK		
D905	48T52445F01	CP., MA151WA		
LEDs				
LD901	48T80059F04	SLR-320VC3 (RED)		
LD902	48T80059F04	SLR-320VC3 (RED)		
LD903	48T80059F04	SLR-320VC3 (RED)		
LD904	48T80059F04	SLR-320VC3 (RED)		
Switches				
S901	40T62951F03	Tact, 10908 (REPEAT)		
S902	40T62951F03	Tact, 10908 (SCAN)		
S903	40T62951F03	Tact, 10908 (FF)		
S904	40T62951F03	Tact, 10908 (REW)		
S905	40T62951F03	Tact, 10908 (PLAY/PAU)		
S906	40T62951F03	Tact, 10908 (EJECT)		
S907	40T62951F03	Tact, 10908 (M-CALL)		
S908	40T62951F03	Tact, 10908 (PRESET)		
S909	40T62951F03	Tact, 10908 (ME)		
S910	40T62951F03	Tact, 10908 (DISP)		

Symbol No.	Part No.	Description		
S911	40T62951F03	Tact, 10908 (DISP)		
S912	40T62951F03	Tact, 10908 (SKIP DOWN)		
S913	40T62951F03	Tact, 10908 (SKIP UP)		
S914	40T62951F03	Tact, 10908 (RESET)		
Lamps				
PL901	65T63304F05	Pilot, 6V-65mA		
PL902	65T81294F02	Pilot, 6V-65mA		
PL903	65T81294F02	Pilot, 6V-65mA		
PL904	65T81294F02	Pilot, 6V-65mA		
PL905	65T81294F02	Pilot, 6V-65mA		
PL906	65T94892F01	Pilot, 6V-65mA		
Resistors (All resistors are chip 1/8W±5% unless otherwise noted.)				
R901	06T70072F21	47 ohm 1/4W		
R902	06T70072F21	47 ohm 1/4W		
R903	06T70072F21	47 ohm 1/4W		
R904	06T70072F17	33 ohm 1/4W		
R905	06T70072F17	33 ohm 1/4W		
R906	06T70072F20	43 ohm 1/4W		
R907	06T70072F20	43 ohm 1/4W		
R908	06T70072F20	43 ohm 1/4W		
R909	06T70072F51	820 ohm 1/4W		
R910	06S53331F02	100k ohm		
R911	06S53331F02	100k ohm		
R912	06S53331F02	100k ohm		
R913	06S53331F02	100k ohm		
R914	06S53331F02	100k ohm		
R915	06S53331F02	100k ohm		
VR401	18T82527F01	Volume, Slide, 100k ohm 2-2 [LD905 (GRN) (Treble) and LD906 (GRN) (Bass) Included]		
Digital P. C. Board				
IC's				
IC6101	51T84009F01	CXD1008		
IC6102	51T84010F01	CXD1009		
IC6103	51T90277F03	HD74HC21FP		
IC6104	51T90277F05	HD74HC164FP		
IC6105	51T90277F04	HD74HC74FP		

Symbol No.	Part No.	Description		
IC6106	51T92863F01	μ PD4464G		
IC6107	51T92863F01	μ PD4464G		
IC6108	51T80136F03	M5238FP		
IC6109	51T80136F03	M5238FP		

Transistors/Diode/Coils/Crystals

Symbol No.	Part No.	Description		
Q6101	48T63417F01	CP., 2SC2412K		
Q6102	48T63420F01	CP., 2SA1037K		
Q6103	48T63420F01	CP., 2SA1037K		
Q6104	48T63417F01	CP., 2SC2412K		
VD6101	48T84049F01	Diode, Varactor, FC53M		
L6101	24T84006F02	Coil, Inductor, 3 μ H		
L6102	91T93280F01	Coil, Filter, ZJS5101		
L6103	91T93280F01	Coil, Filter, ZJS5101		
X6101	48T93793F01	Crystal, AT−51 22.5792MHz		
or	48T92657F03	Crystal, HC−49 22.5792MHz		
X6102	48T93794F01	Crystal, AT−51 24.576MHz		
or	48T92657F01	Crystal, HC−49 24.576MHz		
X6103	48T93792F01	Crystal, AT−51 18.816MHz		
or	48T92657F02	Crystal, HC−49 18.816MHz		

Capacitors

Symbol No.	Part No.	Description		
C6101	08S53332F57	CP., 0.1 μ F		
C6102	08S53332F57	CP., 0.1 μ F		
C6103	08S53332F57	CP., 0.1 μ F		
C6104	08S53332F57	CP., 0.1 μ F		
C6105	08S53332F57	CP., 0.1 μ F		
C6106	08S53332F57	CP., 0.1 μ F		
C6107	08S65128F10	CP., 8pF		
C6108	08S65128F10	CP., 8pF		
C6109	08S65128F10	CP., 8pF		
C6110	08S65128F10	CP., 8pF		
C6111	08S53332F57	CP., 0.1 μ F		
C6112	08S53332F57	CP., 0.1 μ F		
C6113	08S53332F57	CP., 0.1 μ F		
C6114	08S65128F12	CP., 10pF		
C6115	08S65128F12	CP., 10pF		
C6116	08S65128F57	CP., 1000pF		
C6117	08S65128F35	CP., 100pF		
C6118	08S53332F57	CP., 0.1 μ F		
C6119	08T90316F15	TF., 6800pF		
C6120	08S53332F57	CP., 0.1 μ F		
C6121	08S53332F57	CP., 0.1 μ F		
C6122	08T90316F05	TF., 1000pF		

Resistors (All resistors are chip 1/16W±5% unless otherwise noted.)

Symbol No.	Part No.	Description		
R6101	06S64996F04	120k ohm		
R6102	06S64995F69	4.7k ohm		
R6103	06S64995F53	1k ohm		
R6104	06S64995F69	4.7k ohm		
R6105	06S64995F65	3.3k ohm		
R6106	06S64995F67	3.9k ohm		
R6107	06S64995F77	10k ohm		
R6108	06S64995F53	1k ohm		
R6109	06S64995F89	33k ohm		
R6110	06S64995F57	1.5k ohm		
R6111	06S64995F81	15k ohm		
R6112	06S64995F29	100 ohm		
R6113	06S64996F02	100k ohm		
R6114	06S64995F77	10k ohm		
R6115	06S64996F03	110k ohm		
R6116	06S64996F04	120k ohm		
R6117	06S64995F89	33k ohm		
R6118	06S64995F89	33k ohm		
R6119	06S64995F77	10k ohm		
R6120	06S64995F81	15k ohm		
R6121	06S64995F81	15k ohm		
R6122	06S64995F77	10k ohm		
R6123	06S64995F69	4.7k ohm		
R6124	06S53330F77	10k ohm 1/8W		
VR6101	18T69291F01	Variable, H0522A 10k ohmB		
VR6102	18T69291F01	Variable, H0522A 10k ohmB		
VR6103	18T69291F03	Variable, H0522A 220k ohmB		

Miscellaneous

Symbol No.	Part No.	Description		
E801	01T92631F03	Assy., Input RCA Connector		
E802	01T92631F02	Assy., Output RCA Connector		
E803	01T91047F03	Assy., Power Cable RCA		
FL901	65T90275F01	FL Display		

NOTE: When replacing varactor diode, VD6101 always use a diode with the same rank.

Symbol No.	Part No.	Description		
M1	S064−013	Motor, Loading		
M2	SW116−13	Assy., Loading Motor 2 [Included Load Mode Sensor Switch (S5)]		
M3	2Y001A	Assy., Drum Motor [Included Head (HD1) /Heater (TH1)]		
M4	5Z002A	Motor, Capstan		
S1	UE16C−11	Switch, ID-Hole Detector		
S2	UE16C−11	Switch, ID-Hole Detector		
SD1	SW117−12	Assy., Solenoid		
SE1	EZ37A−00	Dew Sensor		

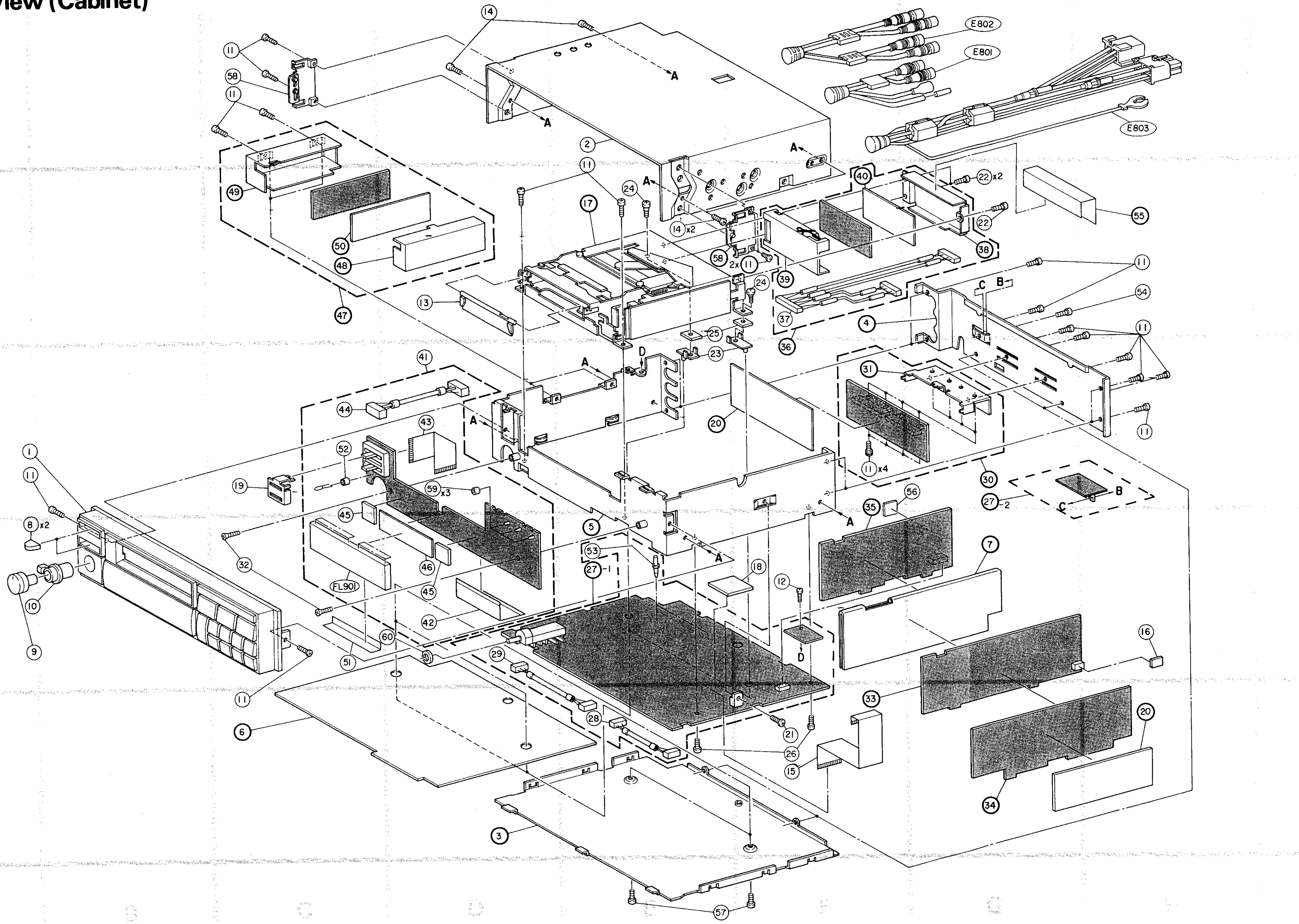
Symbol No.	Part No.	Description		

Cabinet Assembly Parts List

Symbol No.	Index	Part No.	Description		
1	3-A	13D90298F01	Assy., Nosepiece		
2	1-E	15C73492F07	Top Cover		
8	4-A	36B90304F01	Slide Knob		
9	4-A	36A82170F01	Control Knob (Front)		
10	4-A	36A82171F01	Control Knob (Rear)		
11		03S44205G07	Screw, Pan (M2.6×5)		
12	4-F	03S44205G48	Screw, Pan (M2.6×5)		
13	2-D	15A90308F01	Assy., Dust Cover		
14		03S44205G41	Screw, Pan (M2.6×5)		
15	5-F	30T93233F01	Flat Cable (12P)		
16	4-H	75S92415F09	Cushion Rubber		
18	4-F	75S92415F27	Cushion Rubber		
19	3-C	07A94230F01	Shield Bracket (VR)		
21	5-F	03S44205G43	Screw, Bind (M2.6×4)		
22		03S44205G30	Screw, Pan (M2.6×4)		
23	3-E	07A90311F01	Deck Rear Bracket		
24		03A94142F01	Special Screw (M2.3×5.3)		
25	2-E	75A94193F01	Mechanism Cushion		
26	5-F	03S44205G42	Screw, Pan (M2.6×4)		
28	5-E	01T92107F03	Assy., Shield Wire (3P)		
29	4-D	01T92107F05	Assy., Shield Wire (3P)		
32	4-C	03S44205G13	Screw, Countersunk (M2.6×6)		
37	2-F	01T92107F01	Assy., Shield Wire (8P)		
41	3-D	01V91200F58	Assy., Front Panel		
42	4-D	30T90988F01	Flat Cable (24P)		
43	3-D	30T92302F01	Flat Cable (13P) (TONE)		
44	3-C	01T92107F02	Assy., Shield Wire (3P)		
45		75S92415F52	Cushion, Rubber		
46	4-D	14A94194F01	Insulator, FLT		
51	4-C	14A96075F01	Insulator, Cover		
52	3-C	07A71033F01	Support, LED		
53	4-E	09T84840F01	Lug 18mm		
54	2-H	03S44205G70	Screw, Bind (M2.6×6)		
56	3-F	14S71058F53	Insulator		
57	6-E	03S56479F19	Screw, Pan (M2.6×6)		
58		07A80815F01	Assy., Bracket Stopper		
59	3-D	43A62458F03	Bushing, Cover		
60	4-C	04S40070G10	Washer (M9.75)		

NOTE: The parts without part numbers are not supplied.

Exploded View (Cabinet)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11
58
11
2
A
E802
E801
E803
49
50
48
47
11
17
24
14 x2
58
2x 11
40
22 x2
22
55
38
39
24
13
25
23
37
36
4
C
B
11
54
11
11
41
44
43
52
19
59 x3
45
46
45
FL901
42
32
51
60
1
11
8 x2
9
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11
6
A
D
5
53
27-1
20
31
11 x4
30
27-2
B
C
18
12
35
56
7
D
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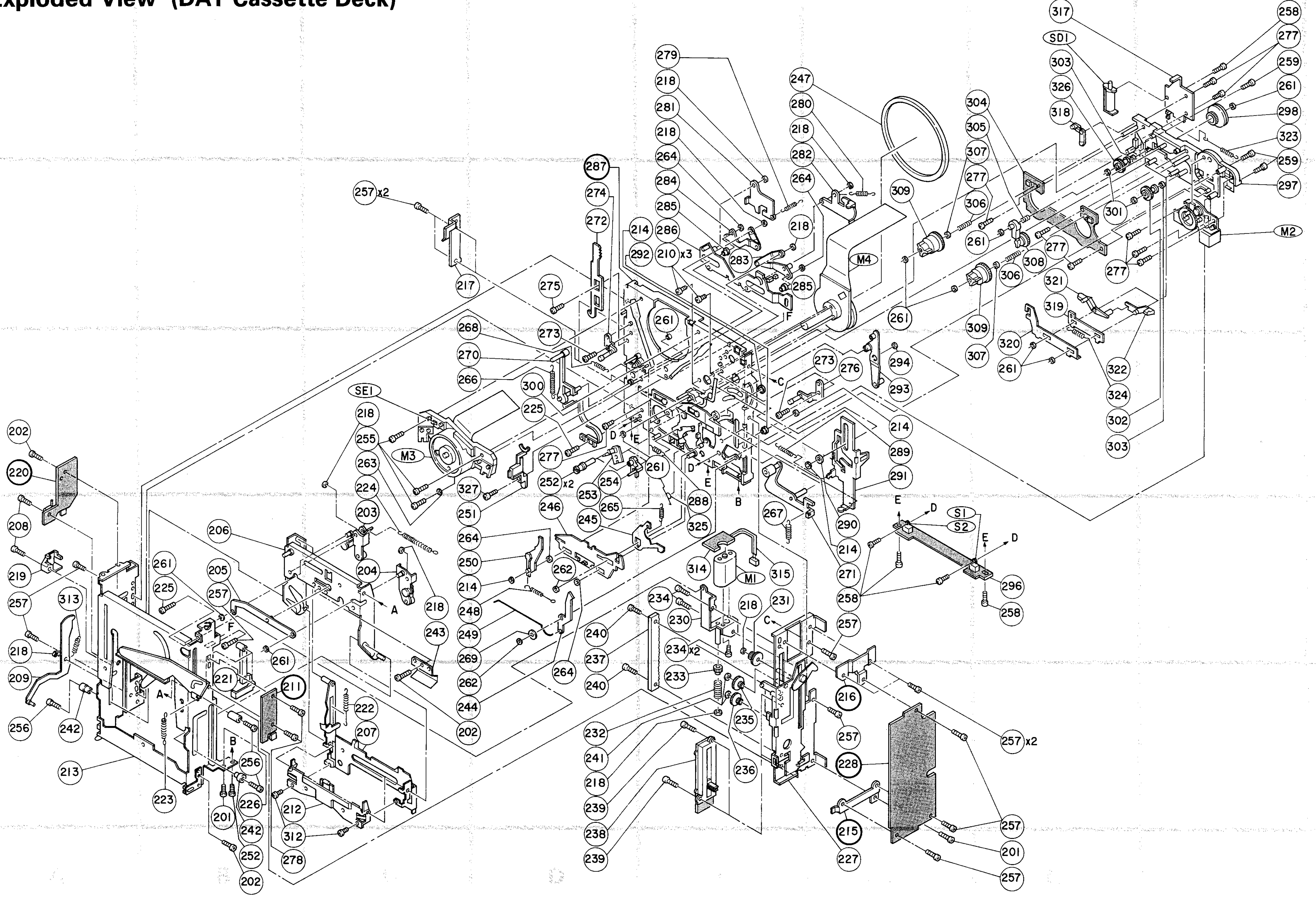
3
57

Exploded View (DAT Cassette Deck)


317
SD1
303
326
318
258
277
259
261
298
323
259
297
304
305
307
277
306
261
301
M2
308
277
277
309
306
321
319
320
322
324
302
303
309
307
261
279
218
281
218
264
284
285
286
214
292
210 x3
287
274
272
247
280
218
282
264
218
283
285
F
M4
261
257 x2
217
275
261
273
268
270
266
300
SE1
218
255
M3
263
224
203
225
277
252 x2
253
254
261
327
251
246
265
245
288
325
D
E
D
E
B
C
273
276
294
293
214
289
291
290
267
214
271
258
S1
S2
E
D
E
D
296
258
202
220
208
219
257
313
218
209
256
242
213
223
261
225
205
257
206
204
A
218
243
F
A
221
261
211
222
207
B
256
226
201
242
252
202
312
212
278
264
250
214
248
249
269
262
244
202
262
264
314
M1
315
234
230
218
231
C
257
240
237
240
234 x2
233
232
241
218
239
238
239
235
236
227
216
257
228
215
257 x2
257
201
257

DAT Cassette Deck Assembly Parts List

Symbol No.	Index	Part No.	Description		
201		FG121-13	Screw, Pan (M2 × 4)		
202		FG164-15	Screw, Pan (M1.7 × 2)		
203	4-C	S065-011	Assy., Eject Arm		
204	4-C	S065-012	Assy., Eject Arm		
205	4-B	S137-014	Slide Sheet		
206	4-B	S137-015	Slide Sheet		
207	5-C	S174-011	Assy., Cassette Holder		
208	4-A	UG12B-11	Screw, Pan (M1.7 × 1.8)		
209	5-A	S176-011	Assy., Arm Lifter		
210	2-E	UG15K-12	Screw, Pan (M1.7 × 2.5)		
212	5-B	S232-011	Assy., Cover		
213	5-A	S232-012	Assy., Cover		
214		FJ123-14	Ring "E" (M1.7)		
217	2-C	SC164-13	Lid Opener (L)		
218		KG111-18	Ring "E" (M1.5)		
219	4-A	SD144-12	F Sensor Cover (L)		
221	5-B	SD145-12	F Lid Opener (R)		
222	5-C	SK123-14	Spring, Lid Opener		
223	5-B	SK124-14	Spring, Lever, Connection		
224	3-C	SK125-12	Spring, Arm, Loading		
225		FG164-20	Screw, Pan (M1.7 × 2.5)		
226	5-B	SL209-11	Collar Holder		
227	6-F	S228-012	Assy., Gear Base		
230	4-E	S149-012	Bracket, Motor		
231	4-E	SN115-11	Warm Wheel (L)		
232	5-D	SN113-11	Warm (L)		
233	5-E	SN114-11	Gear		
234		FG121-16	Screw, Pan (M2 × 2)		
235	5-E	SN116-11	Gear, AL		
236	5-E	SN129-11	Gear, BL		
237	5-D	SN128-11	Rack, LD		
238	6-D	UE16L-14	Assy., Load Mode Sensor (1) P. C. B. [Included Mode Sensor Switch (S4)]		
239		FG164-13	Screw, Pan (M1.7 × 3)		
240		UG16C-17	Screw, Pan (M1.7 × 6)		
241	5-D	UJ13N-16	Ring "E" (M2.1)		

Symbol No.	Index	Part No.	Description		
242		SL221-11	Collar Holder		
243	4-C	SC148-11	Spring		
244	5-C	SC128-12	Lock, Lever		
245	4-D	SC142-12	Spring, Bracket		
246	4-D	SC143-11	Slide F/R		
247	1-E	SF111-13	Belt		
248	4-C	SK115-12	Spring, Lock		
249	4-C	SK116-13	Lock, Link		
250	4-C	SD139-12	Loading BT Arm		
251	4-C	S258-020	Assy., Sensor [Included END Sensor LED (LD1)]		
252		SQ116-11	Assy., Guide Roller		
253	4-D	SD117-12	Assy., IC Base (L)		
254	3-D	SD118-12	Assy., IC Base (R)		
255	3-C	FG140-26	Screw, Pan (M2 × 8)		
256		UG12B-12	Screw, Pan (M1.7 × 5.5)		
257		KG194-25	Screw, Pan (M2 × 4)		
258		FG121-12	Screw, Pan (M2 × 2.5)		
259		FG164-28	Screw, Pan (M1.7 × 8)		
261		FJ123-13	Washer, Polyslider (M1.2)		
262		FJ123-20	Washer, Polyslider (M2.1)		
263	3-C	FJ151-11	Washer, Flat (M2.2)		
264		KG111-19	Ring "E" (M2)		
265	4-D	SK121-16	Spring, Lock		
266	3-C	SK117-13	Spring, Lock		
267	4-E	SK118-16	Spring, Roller P		
268	3-C	SK122-11	Spring, TG-L		
269	4-C	SL129-11	Hook, Collar		
270	3-C	SQ111-12	Assy., Tension Arm		
271	4-F	SR118-12	Assy., Pinch Roller		
272	2-D	SC129-12	Spring-Adjust		
273		KG194-35	Spring, Pan (M2 × 5)		
274	2-D	SQ114-13	Assy., P1-Guide		
275	2-D	FG164-12	Screw, Pan (M1.7 × 2)		
276	3-F	SQ115-13	Assy., P2-Guide		
277		UG11W-13	Screw, Pan (M1.7 × 4)		

NOTE : The parts without part numbers are not supplied.

Symbol No.	Index	Part No.	Description		
278	6-B	UG11W-14	Screw, Pan (M1.7 × 6)		
279	1-E	SK119-12	Spring, Loading (L)		
280	1-E	SK120-12	Spring, Loading (R)		
281	1-E	SC119-11	Spring, Bracket (L)		
282	1-E	SC120-11	Spring, Bracket (R)		
283	2-E	S182-011	Assy., Guide Bracket		
284	2-E	S182-012	Assy., Guide Bracket		
285		SL133-12	Loading Collar		
286	2-E	S137-011	Slide Bracket		
288	4-E	SK132-12	Spring, Slide G		
289	3-F	SK133-11	Spring, TG-(R)		
290	4-F	SL113-13	Slide Roller		
291	3-F	S267-011	Assy., Cam Bracket		
292	2-D	SL139-12	Slide Collar		
293		S051-011	Assy., Clank Lever		
294	3-F	KG111-13	Ring "E" (M3)		
296	4-G	SP126-11	ID-Hole P. C. B.		
297	2-H	S127-012	Sub Chassis Bracket		
298	1-H	SR115-11	Center Pulley		
300	3-D	SZ119-11	Assy., Tension Belt		
301	2-G	UJ13M-11	Ring "E" (M0.9)		
302	3-G	SR119-31	Assy., TU		
303		FJ111-16	Washer, Polyslider (M1.4)		
304	1-F	S258-019	Assy., Sensor [Included Reel Sensor (PT1, 2)]		
305	1-F	SK112-12	Spring, Center		
306	2-F	SK113-12	Spring, BT		
307		UJ12B-11	Luminer		
308	2-G	SR114-13	Assy., ID Gear		
309		SR117-11	Assy., Reel		
312	6-B	UG15K-11	Screw, Pan (M1.7 × 1.6)		
313	4-A	SK126-12	Spring, Door Opener		
314	4-E	SP127-11	LM-P. C. B. (F)		
315	4-E	WH49L-01	Wire, Connector		
317	1-G	SC192-12	Bracket, Solenoid		
318	1-G	SD146-12	Brake Lever		
319	2-G	SC157-11	Brake Drive		
320	3-G	SC159-12	Limiter		
321	2-G	SD132-14	Brake Solenoid (L)		
322	3-G	SD133-14	Brake Solenoid (R)		
323	1-H	SK127-12	Spring, Drive		
324	3-G	SK128-11	Spring, Limiter		
325	4-E	SK114-15	Spring, R-Play BT		
326	1-G	SR119-12	Assy., TU		
327	4-C	SG164-24	Screw, Pan (M1.7 × 4.5)		

Symbol No.	Index	Part No.	Description		

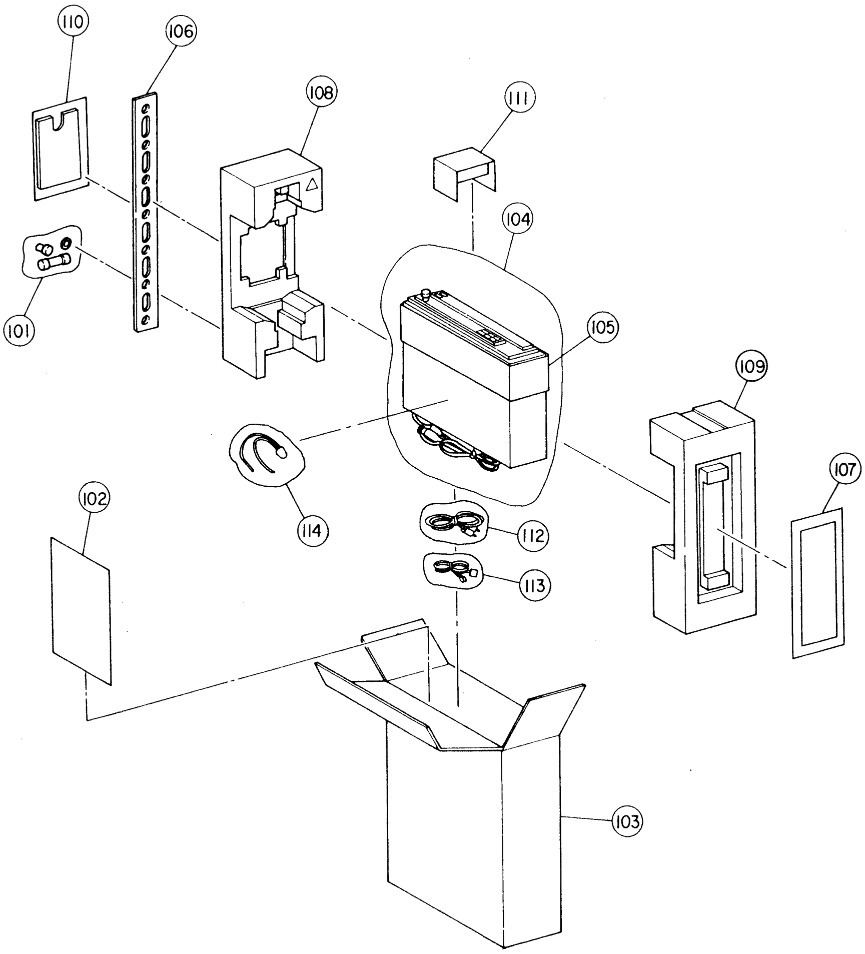
NOTE: The parts without part numbers are not supplied.

Packing Assembly Parts List

Symbol No.	Part No.	Description		
101	01V91200F61	Assy., Installation Kit		
▲ 101-1	03B44963F01	Bolt, Hex W/Washer (M4×8)		
▲ 101-2	03S63857F05	Screw, Tapping (M5×15)		
▲ 101-3	03B44963F02	Bolt, Hex W/Washer (M5×20)		
▲ 101-4	02B47353F02	Nut, Hex (M5)		
▲ 101-5	03S52360F37	Screw, Countersunk (M4×8)		
▲ 101-6	65A40348G04	Fuse, 3A (For BATT & IGN LINE)		
▲ 101-7	46A42363F01	Stud, Bolt		
● 102-1	01V94800F61	Assy., Pamphlet		
▲ 102-1	68P93881F58	Owner's Manual		
▲ 102-2	68P93881F71	Anti, Manual		
103	56S90024F06	Carton Packing (Individual)		
104	56B40990T18	Sack, Polyethylene		
105	15C80814F01	Case, Inner		
106	07B64552F01	Bracket, Strap Receiver		
107	33B81462F01	Face, Plate		
108	56D74205F01	Tray, Packing		
109	56D74205F02	Tray, Packing		
110	01V81300F84	Assy., Bracket Kit		
▲ 110-1	07A80820F01	Bracket, Handle		
111	56A96145F01	Pad, Packing Inner		
112	01T96094F01	Assy., RCA600		
113	01T96095F01	Assy., Connector (4P)		
114	48T71964F01	LED, Remote		

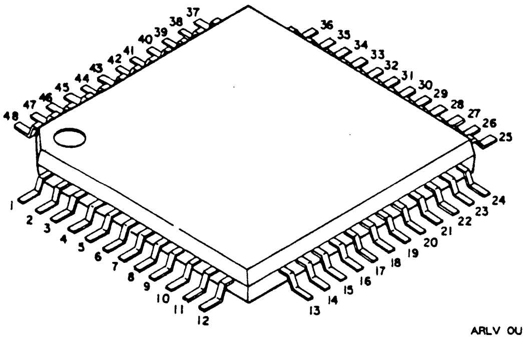
Notes : ● : For North American model only (AO), ▲ : For European model only (EO), Others : Common.

Packing Method View



Semi-Conductor Lead Identifications

CX1045Q: IC101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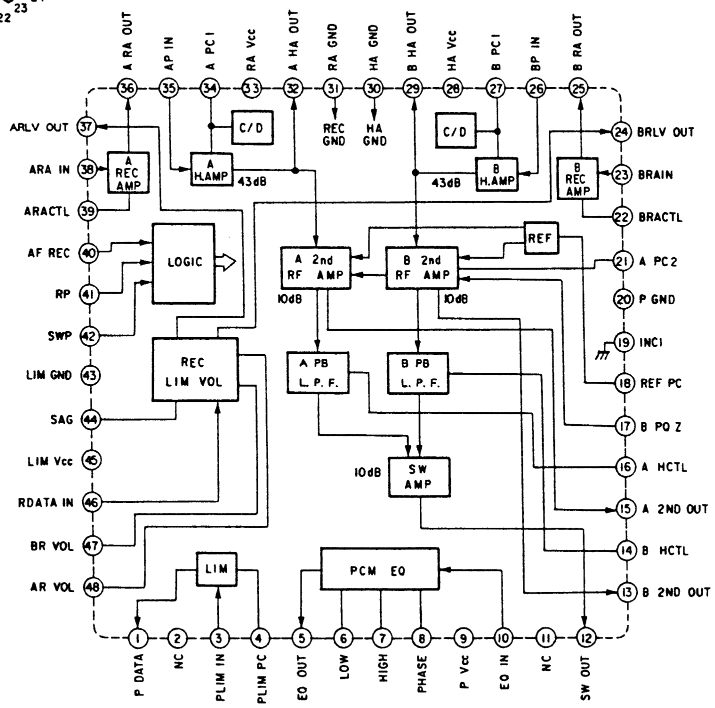
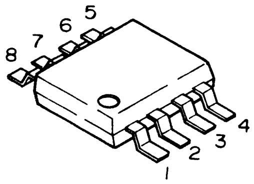
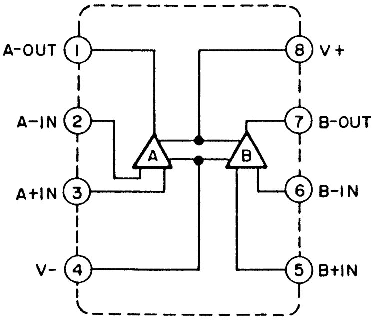
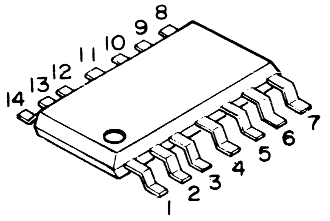

36 A RA OUT
35 AP IN
34 A PC1
33 RA Vcc
32 A HA OUT
31 RA GND
30 HA GND
29 B HA OUT
28 HA Vcc
27 B PC1
26 BP IN
25 B RA OUT
37 ARLV OUT
38 ARA IN
39 ARACTL
40 AF REC
41 RP
42 SWP
43 LIM GND
44 SAG
45 LIM Vcc
46 RDATA IN
47 BR VOL
48 AR VOL
24 BRLV OUT
23 BRAIN
22 BRACTL
21 A PC2
20 P GND
19 INCI
18 REF PC
17 B PQ Z
16 A HCTL
15 A 2ND OUT
14 B HCTL
13 B 2ND OUT
1 P DATA
2 NC
3 PLIM IN
4 PLIM PC
5 EQ OUT
6 LOW
7 HIGH
8 PHASE
9 P Vcc
10 EQ IN
11 NC
12 SW OUT
A REC AMP
A H.AMP
43dB
C/D
REC GND
HA GND
C/D
43dB
B H.AMP
B REC AMP
REF
LOGIC
A 2nd RF AMP
B 2nd RF AMP
10dB
10dB
REC LIM VOL
A PB L.P.F.
B PB L.P.F.
10dB
SW AMP
LIM
PCM EQ

BA4560F : IC301, 304
NJM4560M : IC404, 405, 407, 408
μ PC393G : IC606, 607
NJM5532M : IC303




A-OUT 1
A-IN 2
A+IN 3
V- 4
8 V+
7 B-OUT
6 B-IN
5 B+IN
A
B

NJM2060 : IC302
μ PC324G : IC505, 506, 507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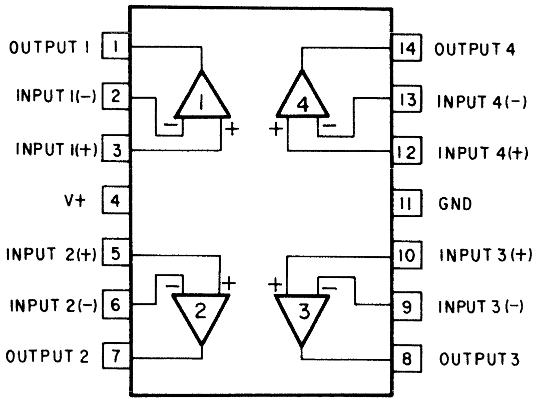
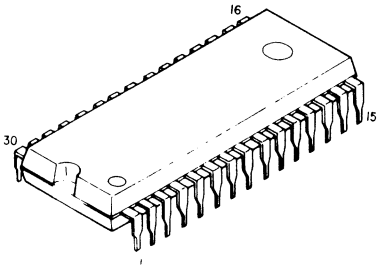
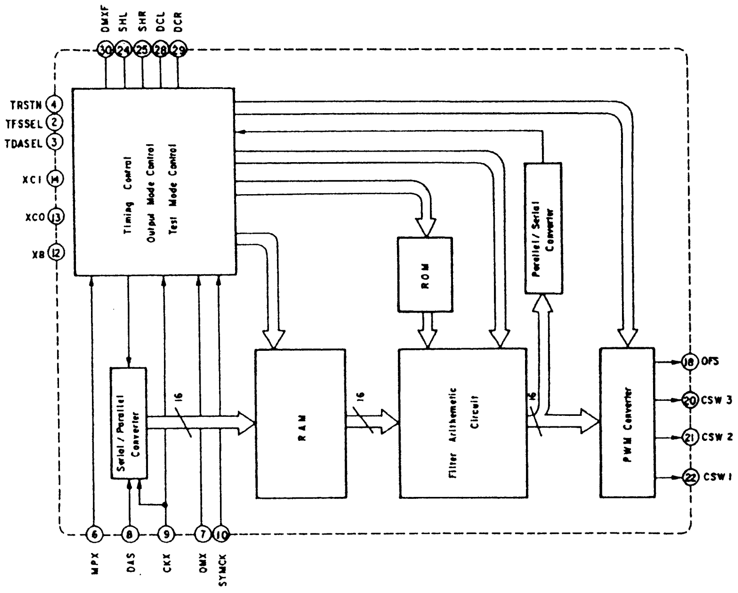
14

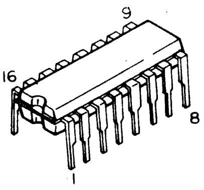

OUTPUT 1 1
INPUT 1(−) 2
INPUT 1(+) 3
V+ 4
INPUT 2(+) 5
INPUT 2(−) 6
OUTPUT 2 7
14 OUTPUT 4
13 INPUT 4(−)
12 INPUT 4(+)
11 GND
10 INPUT 3(+)
9 INPUT 3(−)
8 OUTPUT 3
1
2
3
4
−
+

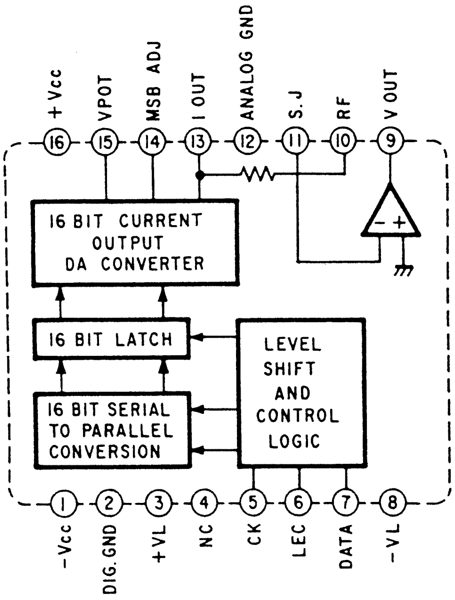
HD49202 : IC401



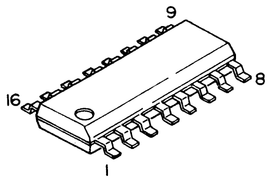

DMXF
SHL
SHR
DCL
DCR
30
24
25
28
29
TRSTN 4
TFSSEL 2
TDASEL 3
XCI 14
XCO 13
XB 12
Timing Control
Output Mode Control
Test Mode Control
ROM
Parallel / Serial Converter
Serial / Parallel Converter
RAM
Filter Arithmetic Circuit
PWM Converter
16
18 OFS
20 CSW 3
21 CSW 2
22 CSW 1
6 MPX
8 DAS
9 CKX
7 OMX
10 SYMCK

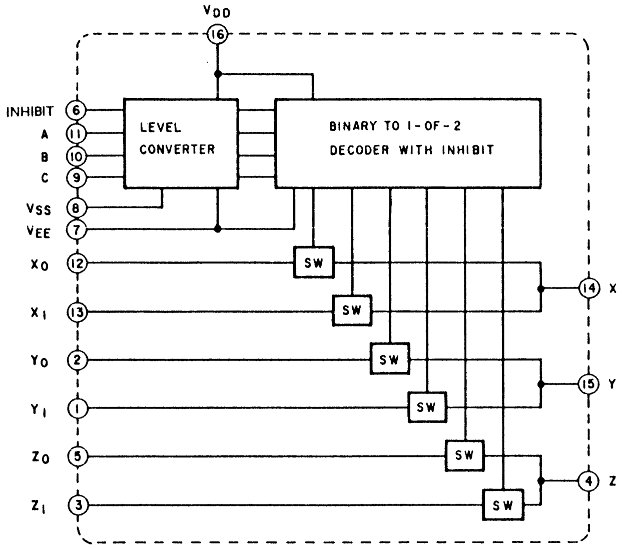
PCM56JP : IC402



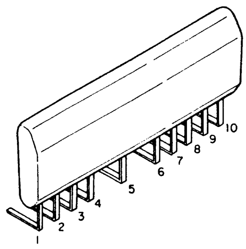

+Vcc 16
VPOT 15
MSB ADJ 14
I OUT 13
ANALOG GND 12
S. J 11
RF 10
V OUT 9
16 BIT CURRENT OUTPUT DA CONVERTER
16 BIT LATCH
16 BIT SERIAL TO PARALLEL CONVERSION
LEVEL SHIFT AND CONTROL LOGIC
− +
1 −Vcc
2 DIG. GND
3 +VL
4 NC
5 CK
6 LEC
7 DATA
8 −VL

μ PD4053BG : IC403




VDD
16
INHIBIT 6
A 11
B 10
C 9
VSS 8
VEE 7
X0 12
X1 13
Y0 2
Y1 1
Z0 5
Z1 3
LEVEL CONVERTER
BINARY TO 1-OF-2 DECODER WITH INHIBIT
SW
SW
SW
SW
SW
SW
14 X
15 Y
4 Z

WLP22D5B8 : IC406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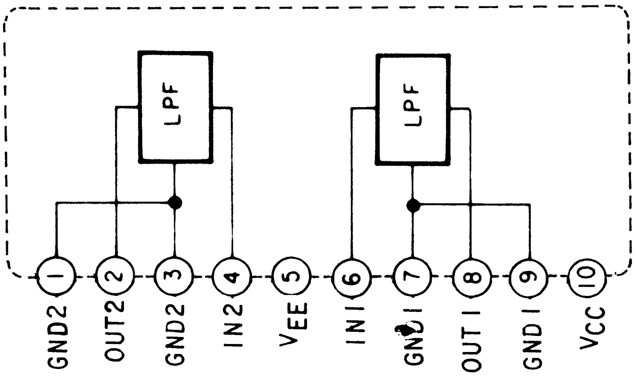
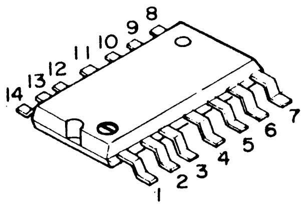

LPF
LPF
1 GND2
2 OUT2
3 GND2
4 IN2
5 VEE
6 IN1
7 GND1
8 OUT1
9 GND1
10 VCC

HD74HC04FP : IC409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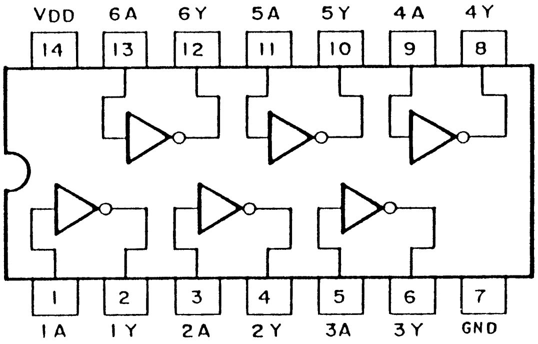
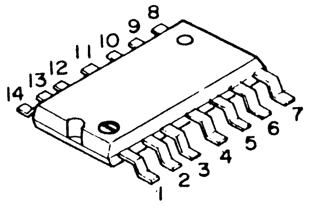
4
5
6
7


VDD 14
6A 13
6Y 12
5A 11
5Y 10
4A 9
4Y 8
1 1A
2 1Y
3 2A
4 2Y
5 3A
6 3Y
7 GND

HD74HC74FP : IC410, 605, 6105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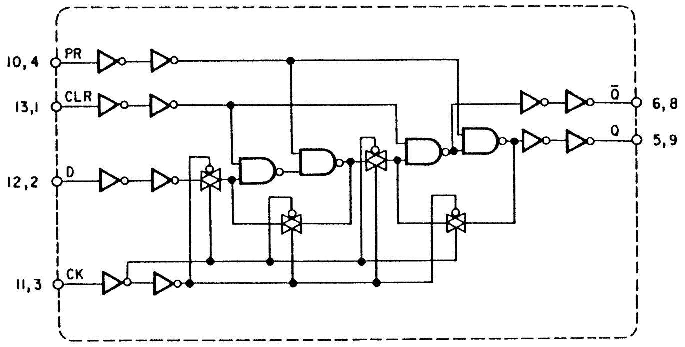
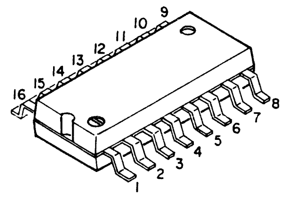

10, 4 PR
13, 1 CLR
12, 2 D
11, 3 CK
Q̄ 6, 8
Q 5, 9

HD74HC161FP : IC411


16
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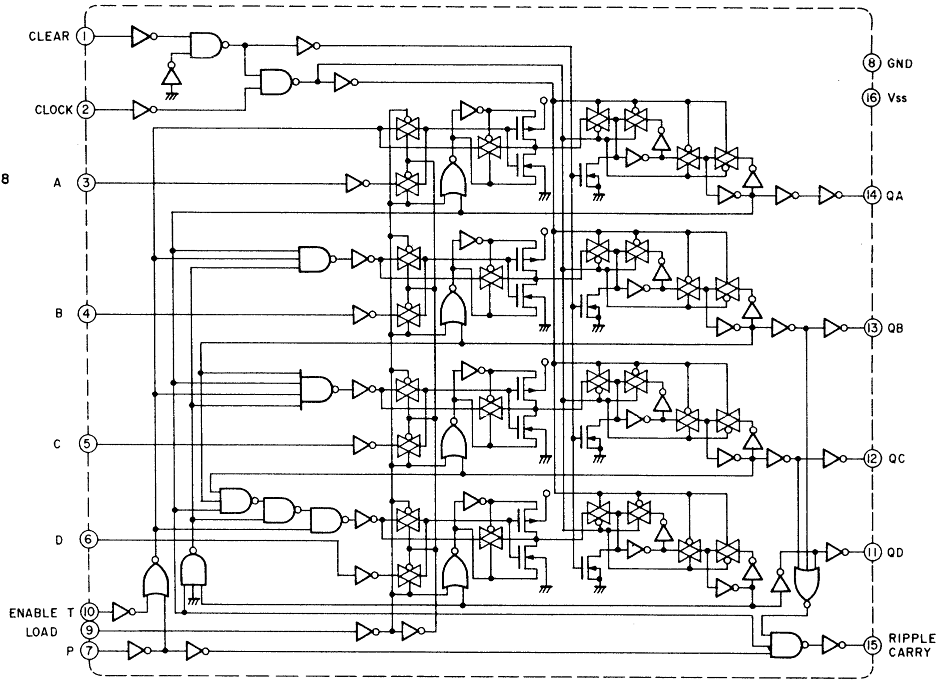
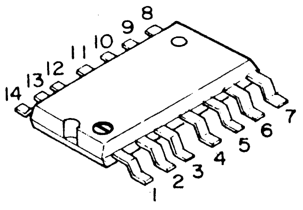
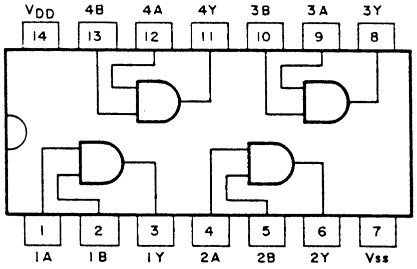
1
2
3
4
5
6
7
8


CLEAR ①
CLOCK ②
A ③
B ④
C ⑤
D ⑥
ENABLE T ⑩
LOAD ⑨
P ⑦
⑧ GND
⑯ Vss
⑭ QA
⑬ QB
⑫ QC
⑪ QD
⑮ RIPPLE CARRY

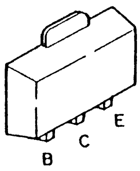
HD74HC08FP : IC412

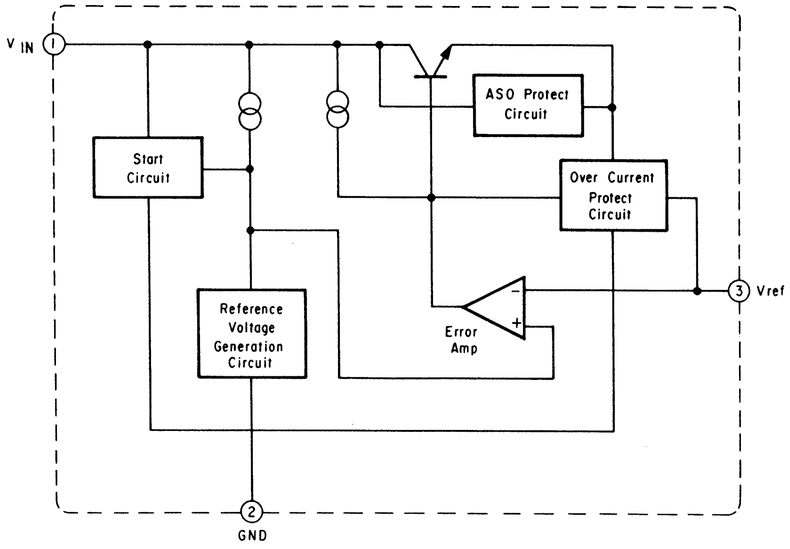
HD74HC00FP : IC604


14
13
12
11
10
9
8
1
2
3
4
5
6
7

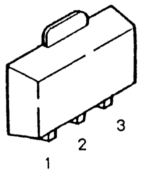

VDD
4B
4A
4Y
3B
3A
3Y
14
13
12
11
10
9
8
1
2
3
4
5
6
7
1A
1B
1Y
2A
2B
2Y
Vss

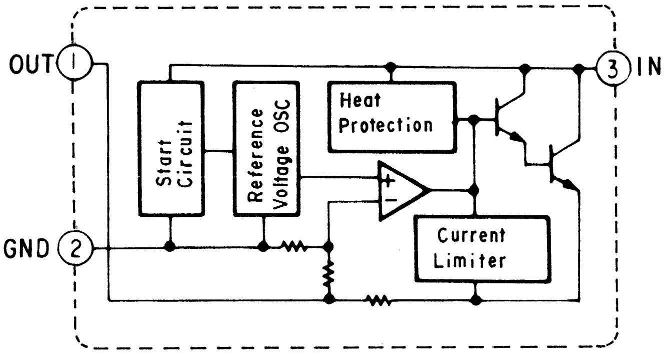
M5236ML : IC413



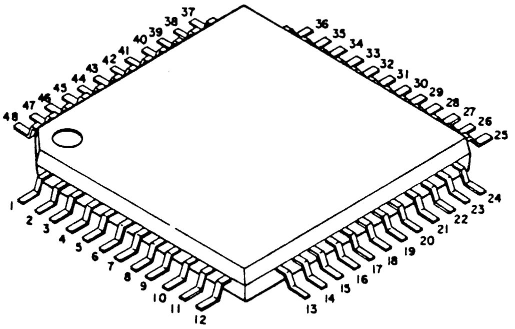

VIN ①
Start Circuit
ASO Protect Circuit
Over Current Protect Circuit
Reference Voltage Generation Circuit
Error Amp
③ Vref
② GND

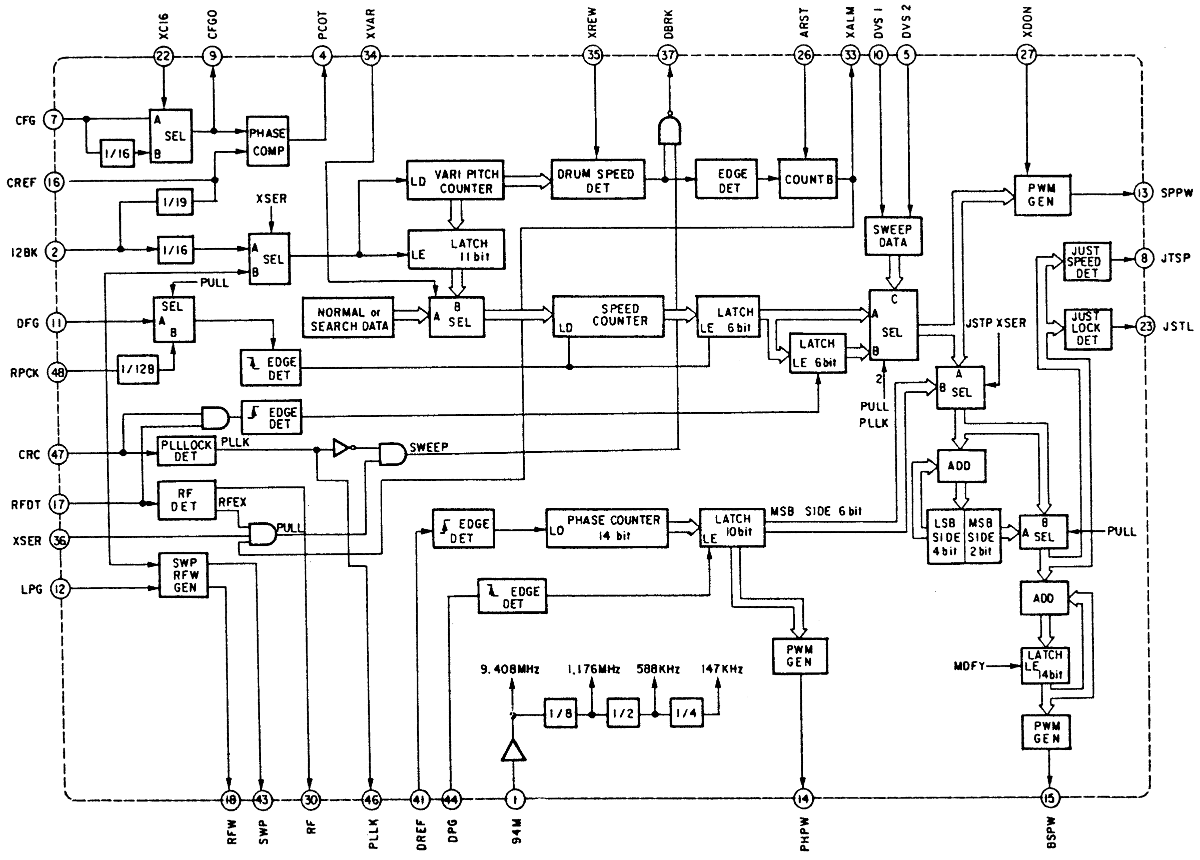
NJM78L05UA: IC414, 851



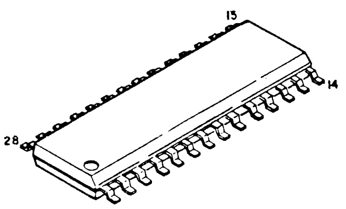

OUT
1
3
IN
GND
2
Start Circuit
Reference Voltage OSC
Heat Protection
+
−
Current Limiter

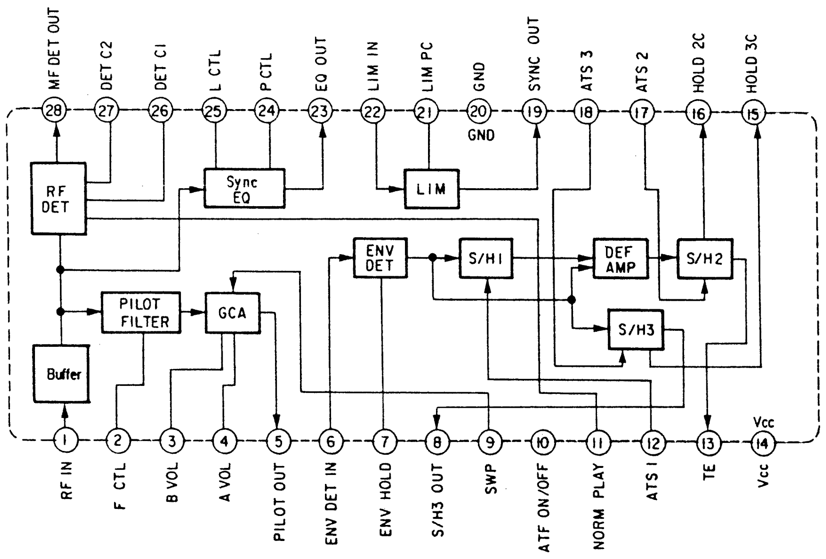
CXD1052Q : IC501


1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23
24
25
26
27
28
29
30
31
32
33
34
35
36
37
38
39
40
41
42
43
44
45
46
47
48

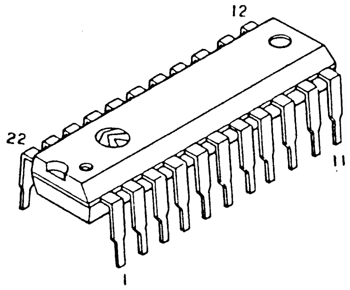

XC16
CFGO
PCOT
XVAR
XREW
DBRK
ARST
XALM
DVS 1
DVS 2
XDON
22
9
4
34
35
37
26
33
10
5
27
CFG 7
SEL
A
B
1/16
PHASE COMP
CREF 16
1/19
XSER
128K 2
1/16
SEL
VARI PITCH COUNTER
LD
DRUM SPEED DET
EDGE DET
COUNT B
PWM GEN
13 SPPW
LATCH 11 bit
LE
SWEEP DATA
JUST SPEED DET
8 JTSP
PULL
DFG 11
SEL
NORMAL or SEARCH DATA
B SEL
SPEED COUNTER
LATCH LE 6 bit
C
SEL
JUST LOCK DET
23 JSTL
RPCK 48
1/128
EDGE DET
LATCH LE 6bit
JSTP XSER
SEL
PULL
PLLK
EDGE DET
CRC 47
PLLLOCK DET
PLLK
SWEEP
ADD
RFDT 17
RF DET
RFEX
XSER 36
PULL
EDGE DET
PHASE COUNTER 14 bit
LO
LATCH 10bit
LE
MSB SIDE 6 bit
LSB SIDE 4 bit
MSB SIDE 2 bit
SEL
PULL
LPG 12
SWP RFW GEN
EDGE DET
ADD
PWM GEN
9.408MHz
1.176MHz
588KHz
147KHz
1/8
1/2
1/4
MDFY
LATCH LE 14 bit
PWM GEN
18
43
30
46
41
44
1
14
15
RFW
SWP
RF
PLLK
DREF
DPG
94M
PHPW
BSPW

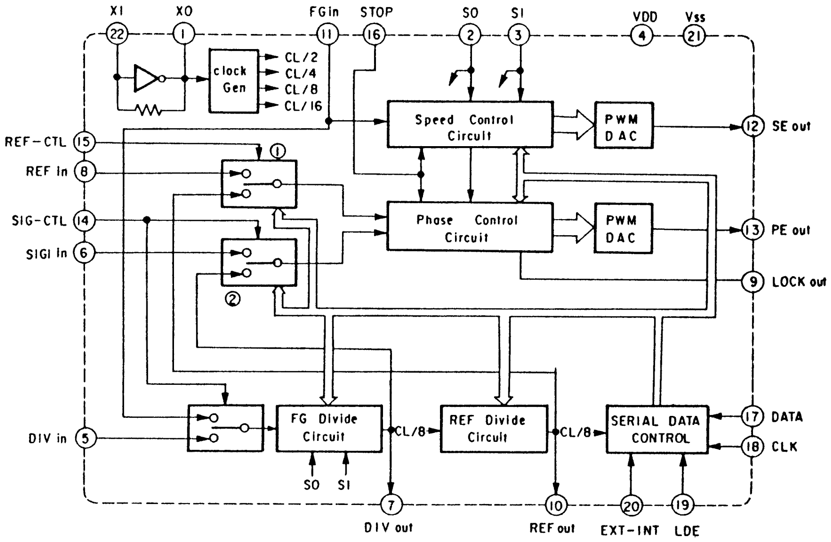
CXA1046M : IC502



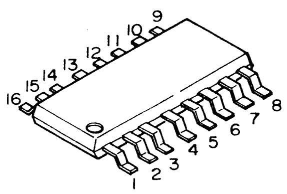

MF DET OUT
DET C2
DET C1
L CTL
P CTL
EQ OUT
LIM IN
LIM PC
GND
SYNC OUT
ATS 3
ATS 2
HOLD 2C
HOLD 3C
28
27
26
25
24
23
22
21
20
19
18
17
16
15
GND
RF DET
Sync EQ
LIM
ENV DET
S/H1
DEF AMP
S/H2
PILOT FILTER
GCA
S/H3
Buffer
Vcc
1
2
3
4
5
6
7
8
9
10
11
12
13
14
RF IN
F CTL
B VOL
A VOL
PILOT OUT
ENV DET IN
ENV HOLD
S/H3 OUT
SWP
ATF ON/OFF
NORM PLAY
ATS 1
TE
Vcc

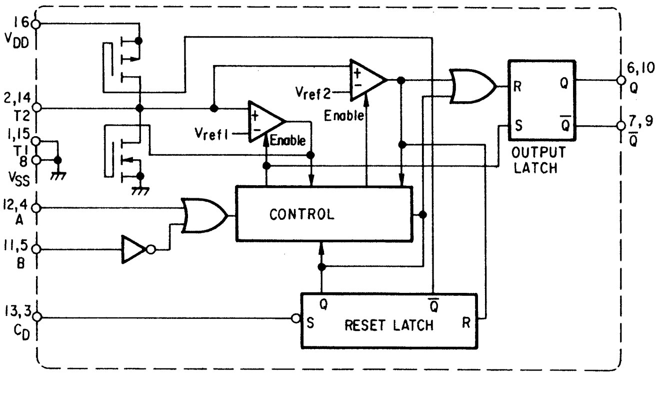
LC7990 : IC503



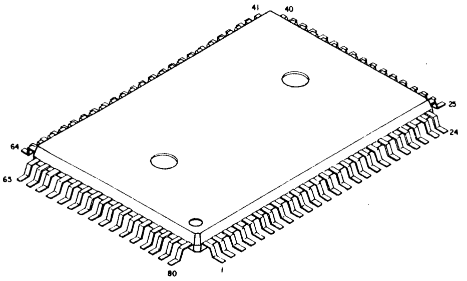

XI
XO
FGIn
STOP
SO
SI
VDD
Vss
22
1
11
16
2
3
4
21
clock Gen
CL/2
CL/4
CL/8
CL/16
Speed Control Circuit
PWM DAC
SE out
12
REF-CTL 15
REF In 8
①
SIG-CTL 14
SIGI In 6
②
Phase Control Circuit
PWM DAC
13 PE out
9 LOCK out
DIV in 5
FG Divide Circuit
SO
SI
CL/8
REF Divide Circuit
CL/8
SERIAL DATA CONTROL
17 DATA
18 CLK
7
DIV out
10
REF out
20
EXT-INT
19
LDE

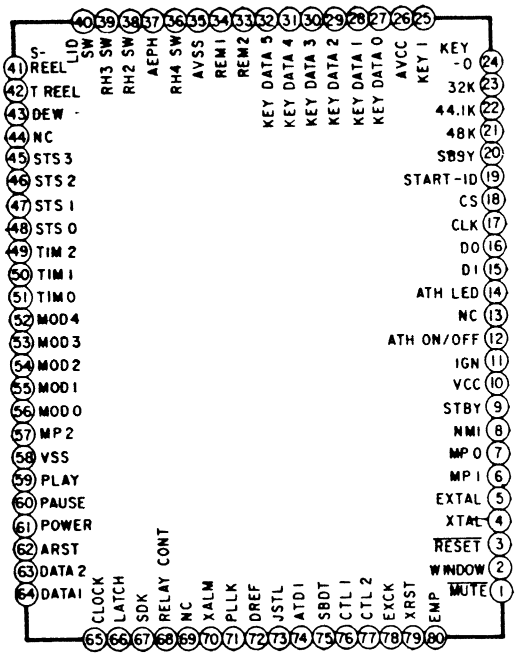
μ PD4538G : IC504


16
15
14
13
12
11
10
9
1
2
3
4
5
6
7
8

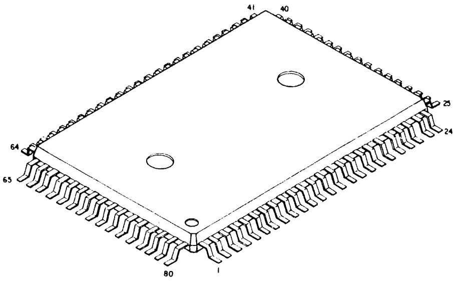

16 VDD
2,14 T2
1,15 T1
8 VSS
12,4 A
11,5 B
13,3 CD
+
-
Vref2
Enable
Vref1
Enable
CONTROL
R Q
S Q̄
OUTPUT LATCH
6,10 Q
7,9 Q̄
Q
Q̄
S RESET LATCH R

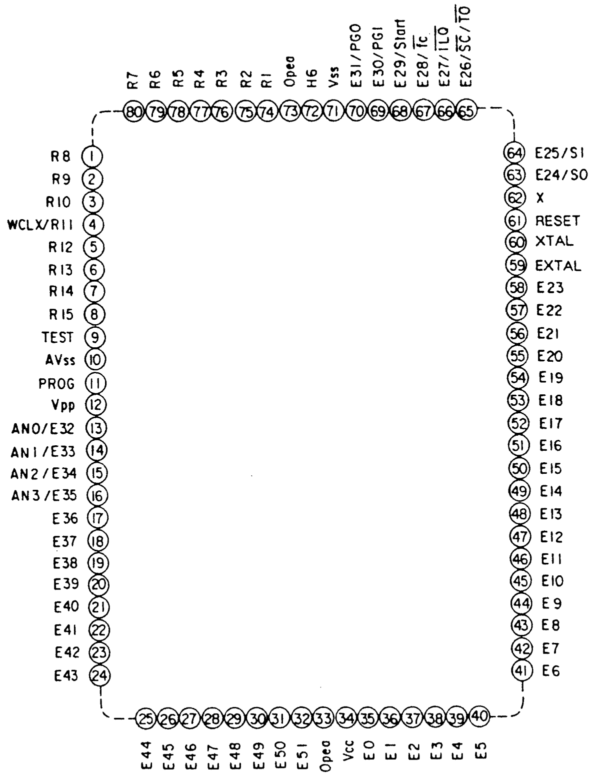
84007F10 : IC601


41
40
25
24
64
65
80
1

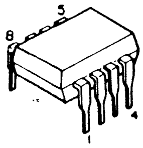

1 MUTE
2 WINDOW
3 RESET
4 XTAL
5 EXTAL
6 MP 1
7 MP 0
8 NMI
9 STBY
10 VCC
11 IGN
12 ATH ON/OFF
13 NC
14 ATH LED
15 DI
16 DO
17 CLK
18 CS
19 START-ID
20 SBSY
21 48K
22 44.1K
23 32K
24 KEY -0
25 KEY 1
26 AVCC
27 KEY DATA 0
28 KEY DATA 1
29 KEY DATA 2
30 KEY DATA 3
31 KEY DATA 4
32 KEY DATA 5
33 REM2
34 REM1
35 AVSS
36 RH4 SW
37 AEPH
38 RH2 SW
39 RH3 SW
40 LID SW
41 S-REEL
42 T REEL
43 DEW
44 NC
45 STS 3
46 STS 2
47 STS 1
48 STS 0
49 TIM 2
50 TIM 1
51 TIM 0
52 MOD 4
53 MOD 3
54 MOD 2
55 MOD 1
56 MOD 0
57 MP 2
58 VSS
59 PLAY
60 PAUSE
61 POWER
62 ARST
63 DATA 2
64 DATA 1
65 CLOCK
66 LATCH
67 SDK
68 RELAY CONT
69 NC
70 XALM
71 PLLK
72 DREF
73 JSTL
74 ATD1
75 SBDT
76 CTL 1
77 CTL 2
78 EXCK
79 XRST
80 EMP

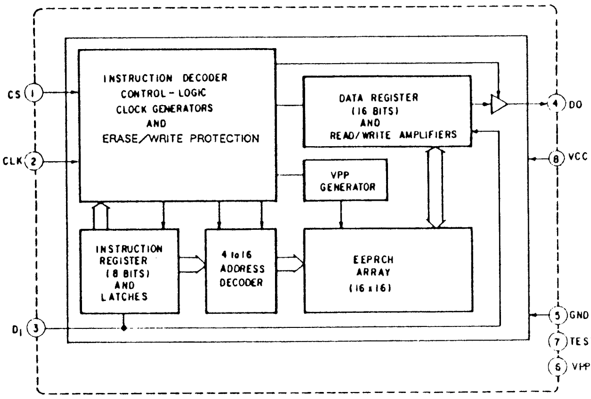
83388F07 : IC602


41
40
25
24
64
65
80
1

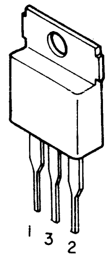

1 R8
2 R9
3 R10
4 WCLX/R11
5 R12
6 R13
7 R14
8 R15
9 TEST
10 AVss
11 PROG
12 Vpp
13 AN0/E32
14 AN1/E33
15 AN2/E34
16 AN3/E35
17 E36
18 E37
19 E38
20 E39
21 E40
22 E41
23 E42
24 E43
25 E44
26 E45
27 E46
28 E47
29 E48
30 E49
31 E50
32 E51
33 Opeo
34 Vcc
35 E0
36 E1
37 E2
38 E3
39 E4
40 E5
41 E6
42 E7
43 E8
44 E9
45 E10
46 E11
47 E12
48 E13
49 E14
50 E15
51 E16
52 E17
53 E18
54 E19
55 E20
56 E21
57 E22
58 E23
59 EXTAL
60 XTAL
61 RESET
62 X
63 E24/SO
64 E25/SI
65 E26/SC/TO
66 E27/ILO
67 E28/fc
68 E29/Start
69 E30/PG1
70 E31/PG0
71 Vss
72 H6
73 Opeo
74 R1
75 R2
76 R3
77 R4
78 R5
79 R6
80 R7

ER59256G1 : IC603

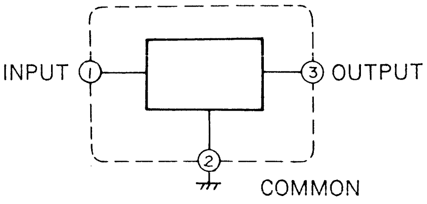



INSTRUCTION DECODER
CONTROL - LOGIC
CLOCK GENERATORS
AND
ERASE/WRITE PROTECTION
DATA REGISTER
(16 BITS)
AND
READ/WRITE AMPLIFIERS
VPP
GENERATOR
INSTRUCTION
REGISTER
(8 BITS)
AND
LATCHES
4 to 16
ADDRESS
DECODER
EEPRCH
ARRAY
(16 x 16)
CS 1
CLK 2
DI 3
4 DO
8 VCC
5 GND
7 TEST
6 VPP

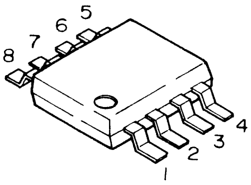
µ PC7805 : IC608

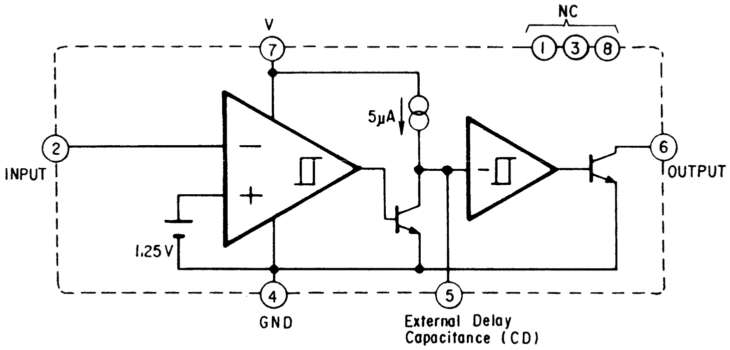


1 : INPUT
2 : COMMON
3 : OUTPUT

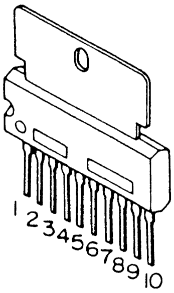

INPUT ①
③ OUTPUT
②
COMMON

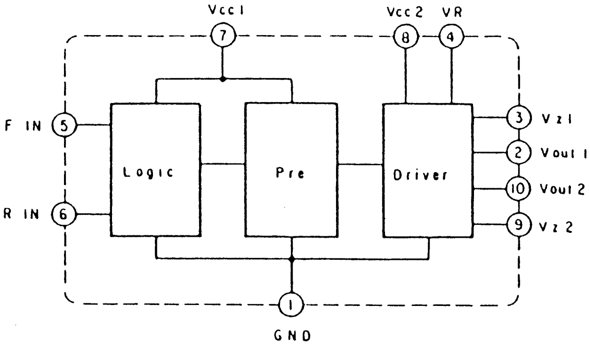
M51957BFP : IC609



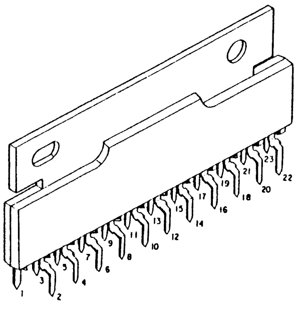

V
⑦
NC
① ③ ⑧
② INPUT
5μA
1.25V
⑥ OUTPUT
④ GND
⑤
External Delay
Capacitance (CD)

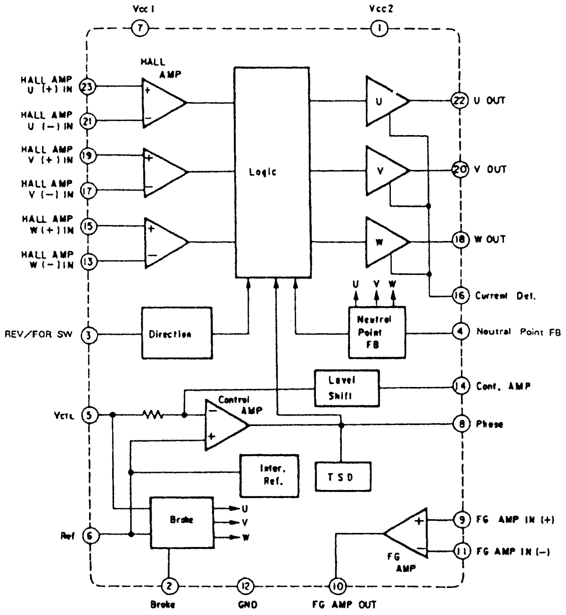
BA6209 : IC701, 702


1
2
3
4
5
6
7
8
9
10

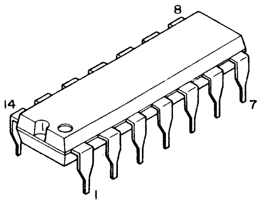

Vcc 1
⑦
Vcc 2
⑧
VR
④
F IN ⑤
R IN ⑥
Logic
Pre
Driver
③ Vz 1
② Vout 1
⑩ Vout 2
⑨ Vz 2
①
GND

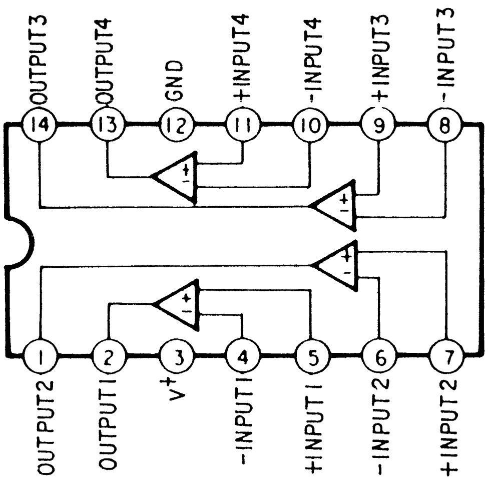
HA13403V : IC703, 704


1
2
3
4
5
6
7
8
9
10
11
12
13
14
15
16
17
18
19
20
21
22
23

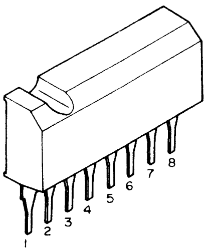

Vcc 1
⑦
Vcc2
①
HALL AMP
HALL AMP U (+) IN ㉓
HALL AMP U (−) IN ㉑
HALL AMP V (+) IN ⑲
HALL AMP V (−) IN ⑰
HALL AMP W (+) IN ⑮
HALL AMP W (−) IN ⑬
Logic
U
V
W
㉒ U OUT
⑳ V OUT
⑱ W OUT
⑯ Current Det.
REV/FOR SW ③
Direction
U V W
Neutral Point FB
④ Neutral Point FB
Level Shift
⑭ Cont. AMP
VCTL ⑤
Control AMP
⑧ Phase
Inter. Ref.
TSD
Brake
U
V
W
Ref ⑥
⑨ FG AMP IN (+)
⑪ FG AMP IN (−)
FG AMP
②
Brake
⑫
GND
⑩
FG AMP OUT

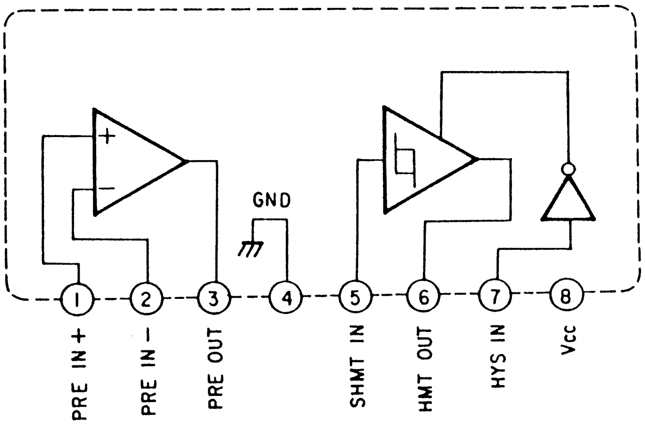
NJM2901N : IC705



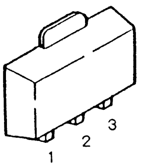

OUTPUT3
OUTPUT4
GND
+INPUT4
-INPUT4
+INPUT3
-INPUT3
14
13
12
11
10
9
8
1
2
3
4
5
6
7
OUTPUT2
OUTPUT1
V+
-INPUT1
+INPUT1
-INPUT2
+INPUT2

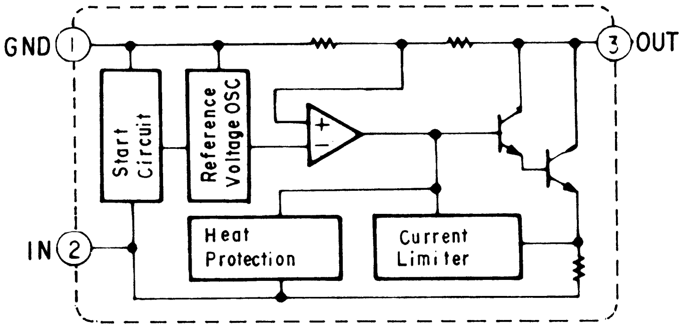
BA6305 : IC706



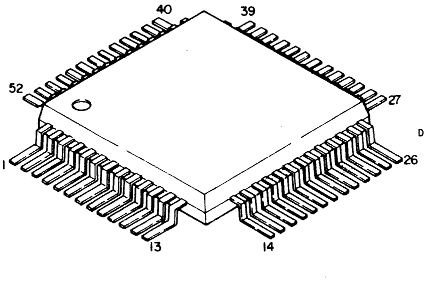

GND
1
2
3
4
5
6
7
8
PRE IN +
PRE IN -
PRE OUT
SHMT IN
HMT OUT
HYS IN
Vcc

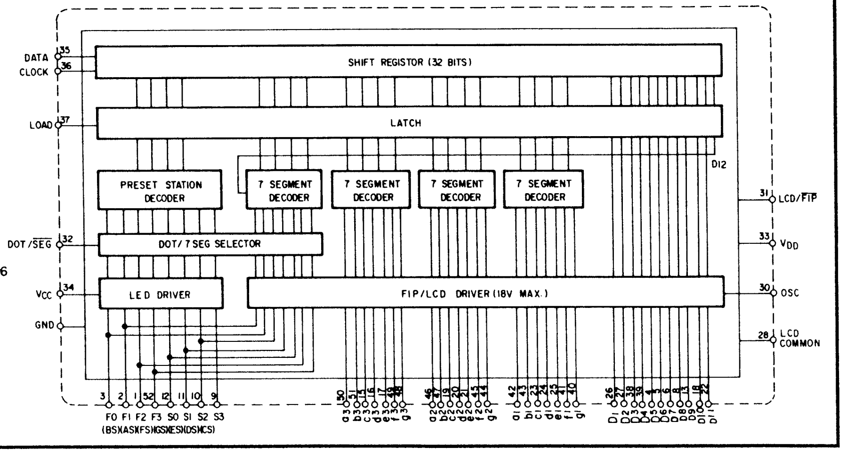
NJM79L05UA : IC852



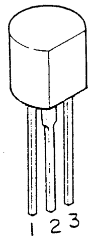

GND 1
3 OUT
Start Circuit
Reference Voltage OSC
IN 2
Heat Protection
Current Limiter

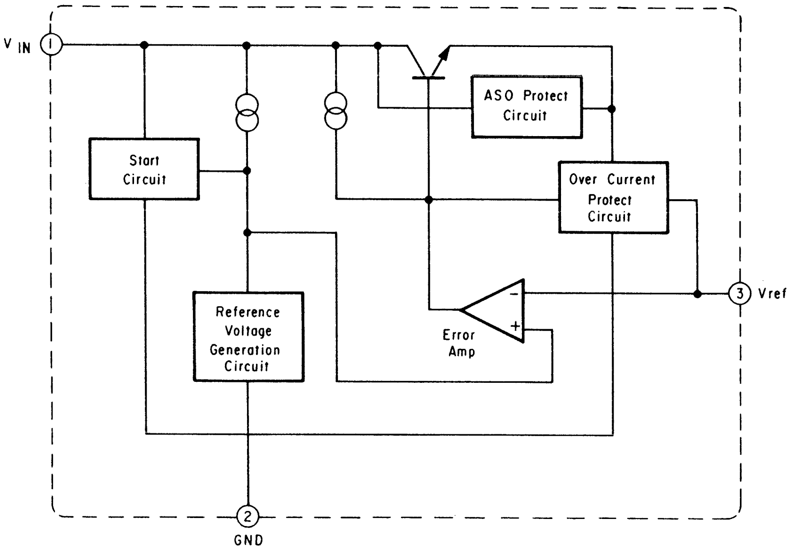
μ PD6320GC : IC901, 902


40
39
52
27
1
26
13
14

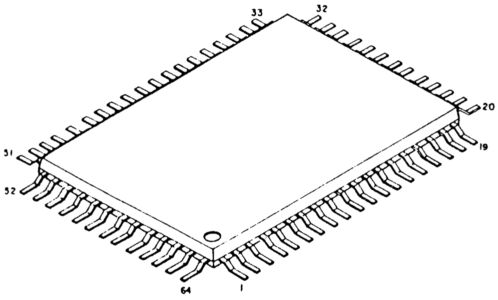

DATA 35
CLOCK 36
SHIFT REGISTOR (32 BITS)
LOAD 37
LATCH
D12
PRESET STATION DECODER
7 SEGMENT DECODER
7 SEGMENT DECODER
7 SEGMENT DECODER
7 SEGMENT DECODER
31 LCD/FIP
DOT/SEG 32
DOT/7SEG SELECTOR
33 VDD
VCC 34
LED DRIVER
FIP/LCD DRIVER (18V MAX.)
30 OSC
GND
28 LCD COMMON
3 2 1 52 12 11 10 9
F0 F1 F2 F3 S0 S1 S2 S3
(BS)(AS)(FS)(GS)(ES)(DS)(CS)
50 51 15 16 17 49 48
a3 b3 c3 d3 e3 f3 g3
46 47 19 20 21 45 44
a2 b2 c2 d2 e2 f2 g2
42 43 23 24 25 41 40
a1 b1 c1 d1 e1 f1 g1
26 27 38 39 4 5 6 8 13 18 22
D1 D2 D3 D4 D5 D6 D7 D8 D9 D10 D11

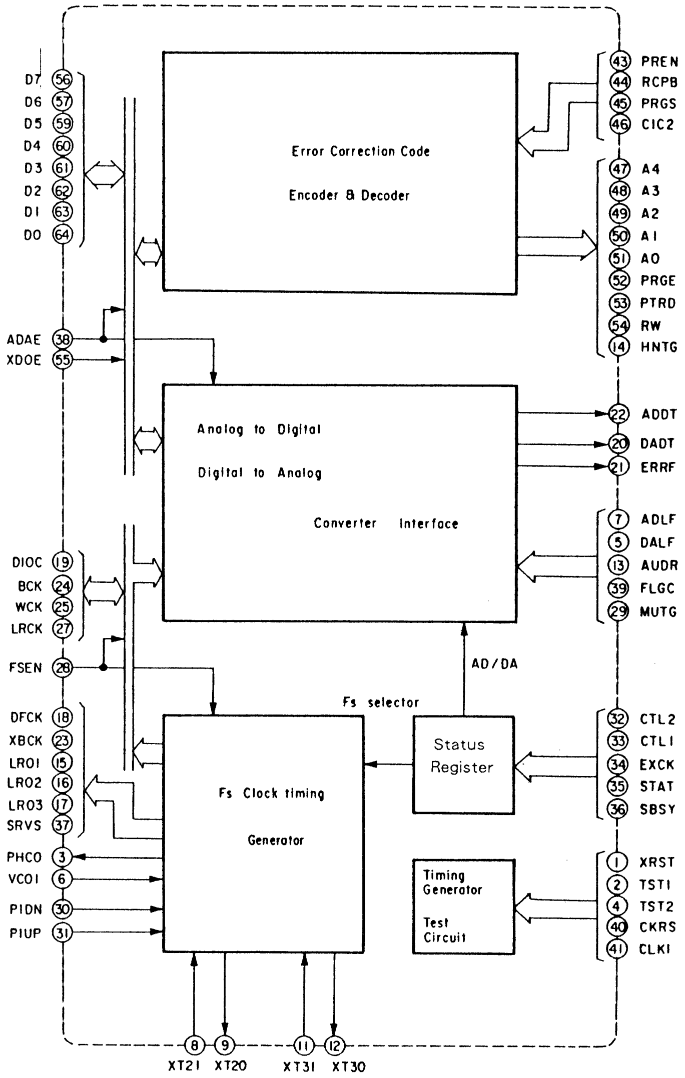
M5236ML : IC1001, 1002



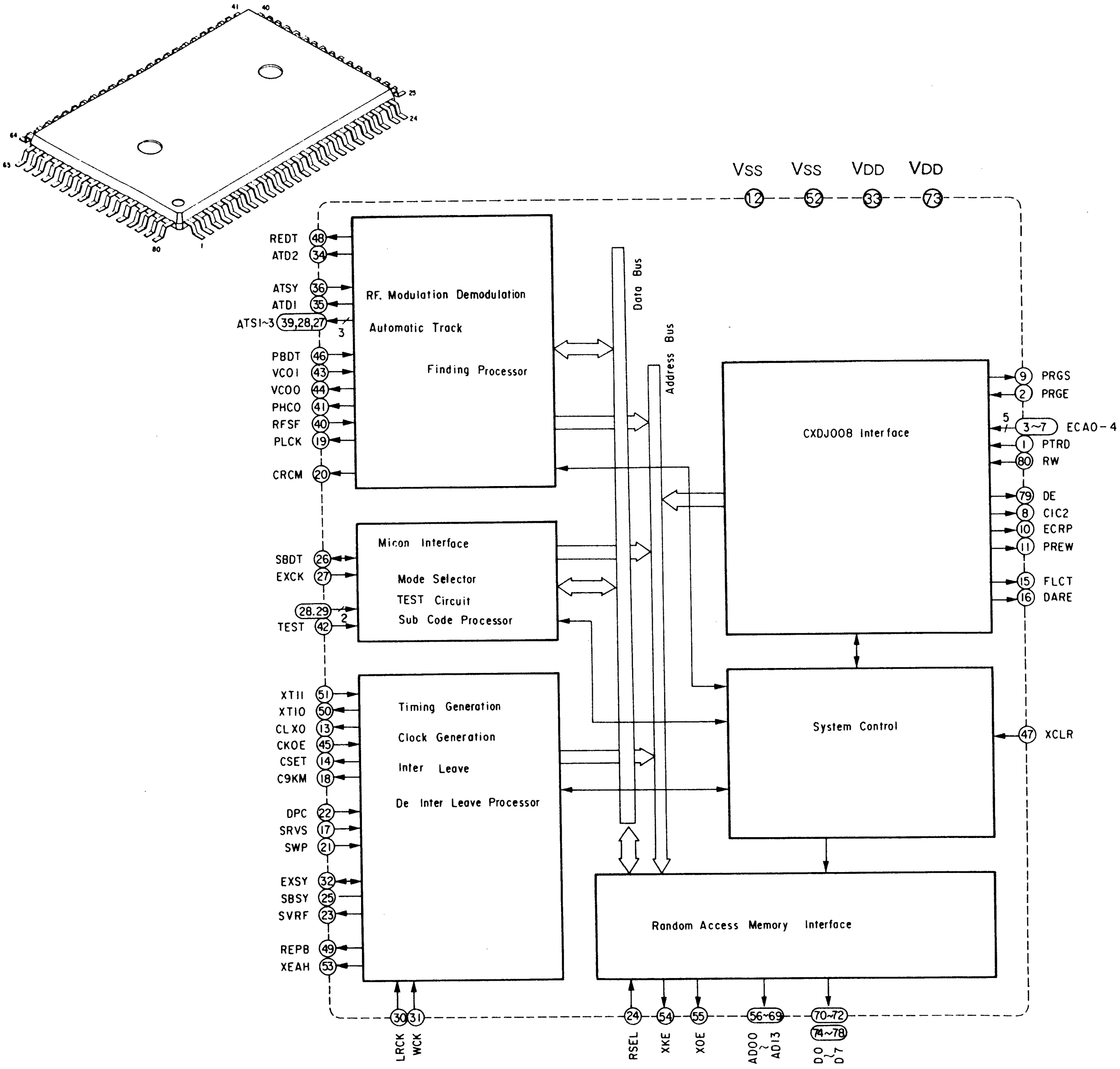

V IN
1
Start Circuit
ASO Protect Circuit
Over Current Protect Circuit
Reference Voltage Generation Circuit
Error Amp
3
Vref
2
GND

CXD1008 : IC6101

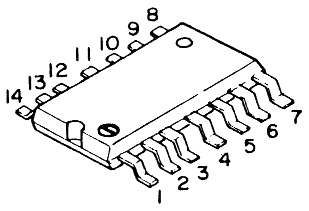

33
32
20
19
51
52
64
1

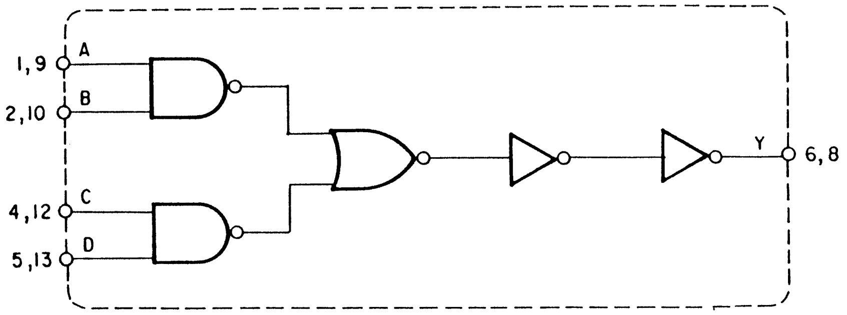

D7 56
D6 57
D5 59
D4 60
D3 61
D2 62
D1 63
D0 64
ADAE 38
XDOE 55
DIOC 19
BCK 24
WCK 25
LRCK 27
FSEN 28
DFCK 18
XBCK 23
LRO1 15
LRO2 16
LRO3 17
SRVS 37
PHCO 3
VCO1 6
PIDN 30
PIUP 31
Error Correction Code
Encoder & Decoder
Analog to Digital
Digital to Analog
Converter Interface
AD/DA
Fs selector
Fs Clock timing
Generator
Status Register
Timing Generator
Test Circuit
43 PREN
44 RCPB
45 PRGS
46 CIC2
47 A4
48 A3
49 A2
50 A1
51 A0
52 PRGE
53 PTRD
54 RW
14 HNTG
22 ADDT
20 DADT
21 ERRF
7 ADLF
5 DALF
13 AUDR
39 FLGC
29 MUTG
32 CTL2
33 CTL1
34 EXCK
35 STAT
36 SBSY
1 XRST
2 TST1
4 TST2
40 CKRS
41 CLKI
8 XT21
9 XT20
11 XT31
12 XT30

CXD1009 : IC6102

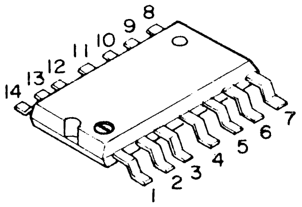

41
40
25
24
64
65
80
1
Vss
Vss
VDD
VDD
12
52
33
73
REDT 48
ATD2 34
ATSY 36
ATDI 35
ATSI~3 39,28,27
3
PBDT 46
VCOI 43
VCOO 44
PHCO 41
RFSF 40
PLCK 19
CRCM 20
RF. Modulation Demodulation
Automatic Track
Finding Processor
Data Bus
Address Bus
CXDJ008 Interface
9 PRGS
2 PRGE
5
3~7 ECA0-4
1 PTRD
80 RW
79 DE
8 CIC2
10 ECRP
11 PREW
15 FLCT
16 DARE
SBDT 26
EXCK 27
28.29
2
TEST 42
Micon Interface
Mode Selector
TEST Circuit
Sub Code Processor
XTII 51
XTIO 50
CLXO 13
CKOE 45
CSET 14
C9KM 18
DPC 22
SRVS 17
SWP 21
EXSY 32
SBSY 25
SVRF 23
REPB 49
XEAH 53
Timing Generation
Clock Generation
Inter Leave
De Inter Leave Processor
System Control
47 XCLR
Random Access Memory Interface
30 31
LRCK
WCK
24 RSEL
54 XKE
55 XOE
56~69 AD00 ~ AD13
70~72 74~78 D0 ~ D7

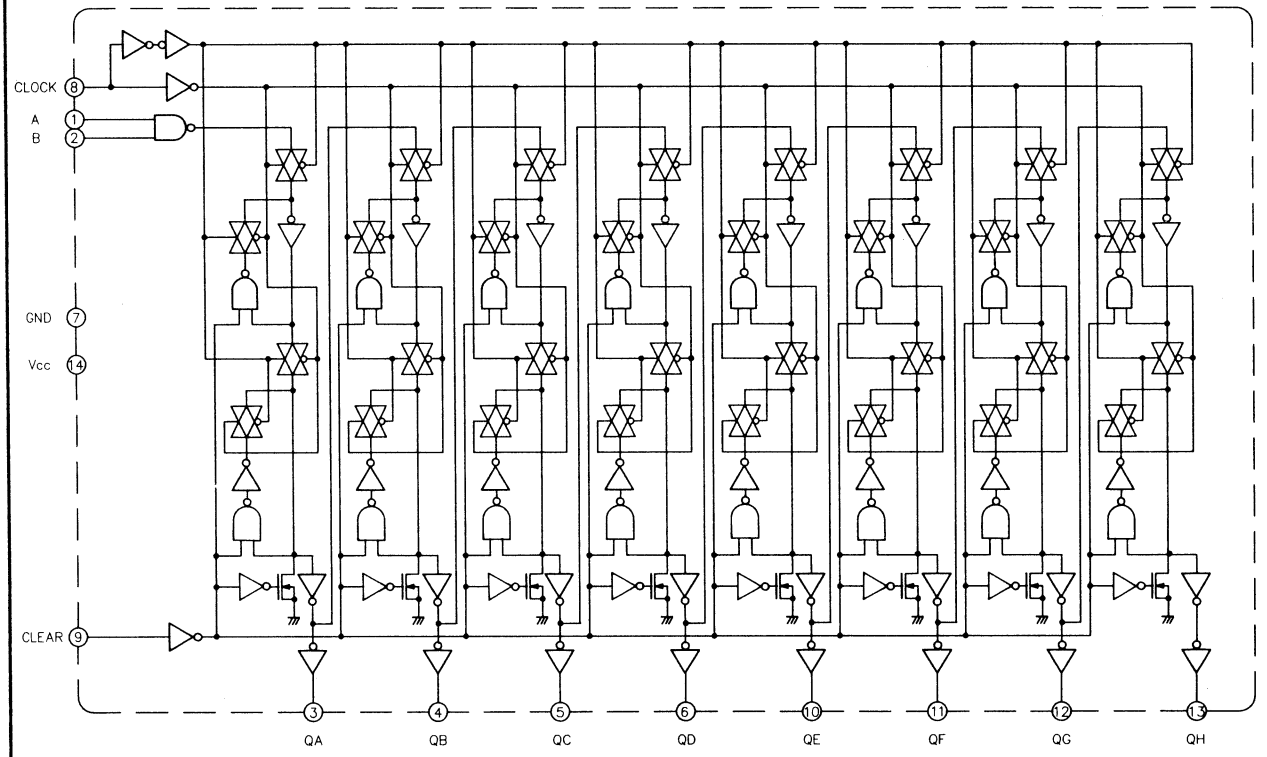
HD74HC21FP : IC6103


8
9
10
11
12
13
14
1
2
3
4
5
6
7

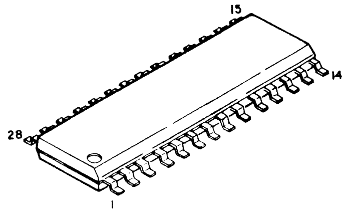

1,9
A
2,10
B
4,12
C
5,13
D
Y
6,8

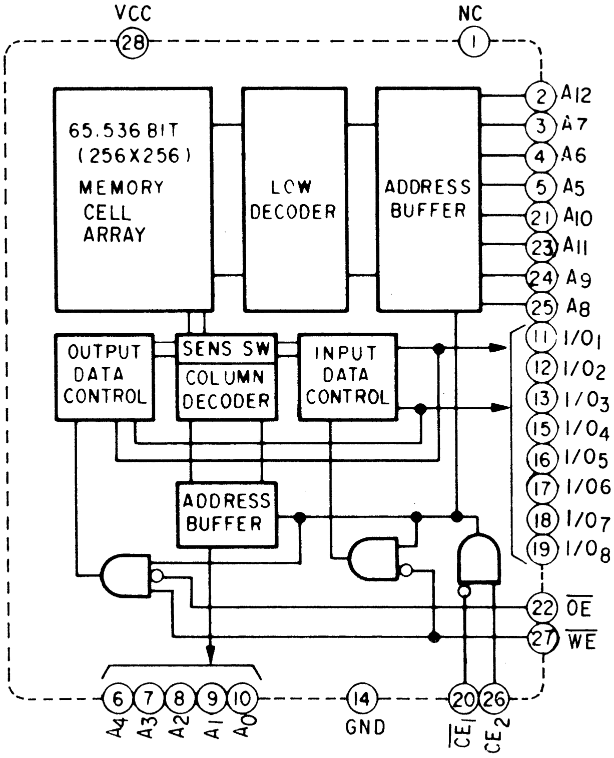
HD74HC164FP : IC6104


8
9
10
11
12
13
14
7
6
5
4
3
2
1

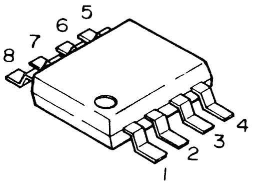

CLOCK 8
A 1
B 2
GND 7
Vcc 14
CLEAR 9
3 QA
4 QB
5 QC
6 QD
10 QE
11 QF
12 QG
13 QH

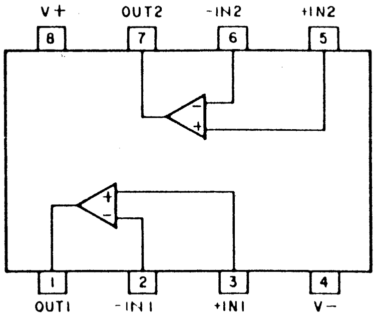
µ PD4464G : IC6106, 6107



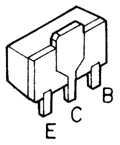

VCC 28
NC 1
65.536 BIT (256X256) MEMORY CELL ARRAY
LOW DECODER
ADDRESS BUFFER
2 A12
3 A7
4 A6
5 A5
21 A10
23 A11
24 A9
25 A8
OUTPUT DATA CONTROL
SENS SW
COLUMN DECODER
INPUT DATA CONTROL
11 I/O1
12 I/O2
13 I/O3
15 I/O4
16 I/O5
17 I/O6
18 I/O7
19 I/O8
ADDRESS BUFFER
22 OE
27 WE
6 A4
7 A3
8 A2
9 A1
10 A0
14 GND
20 CE1
26 CE2

M5238FP : IC6108, 6109



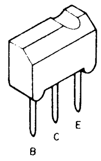

V+
OUT2
-IN2
+IN2
8
7
6
5
1
2
3
4
OUT1
-IN1
+IN1
V−

2SD1766 : Q101, 608



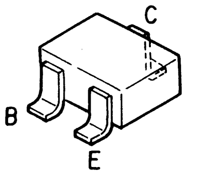
2SD1227 : Q301, 705

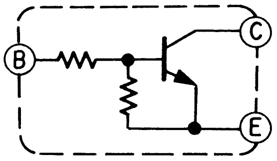
2SB911M: Q404, 616, 617, 618, 619, 623, 1001



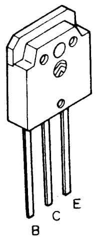
DTC124K : Q302, 401, 402, 403, 501, 503, 505, 601,
Q602, 603, 604, 606, 611, 612, 624, 625,
Q656, 658, 660, 703, 801

DTC114K : Q626, 627

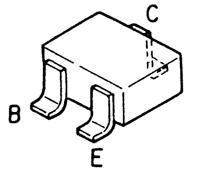




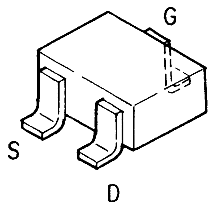
2SD1330 : Q304, 305, 306, 307



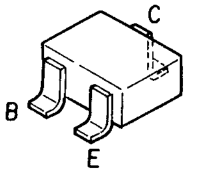
2SD1328 : Q308
2SC2412K : Q150, 151, 152, 303, 609, 621, 622, 6101, 6104
2SD1383K : Q708
2SA1037K : Q6102, 6103

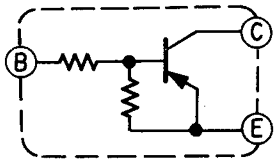


2SK198 : Q504

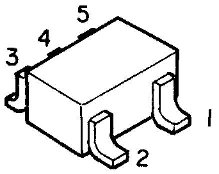


DTA114 : Q610
DTA124 : Q659

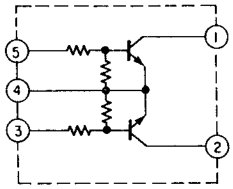




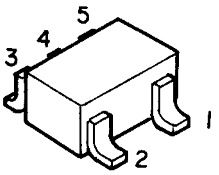
FMG1 : Q613~615



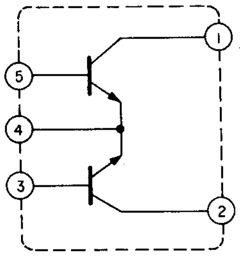
1. Collector
2. Collector
3. Base
4. Emitter
5. Base



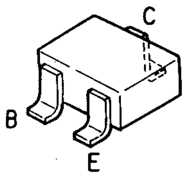
FMW1 : Q620

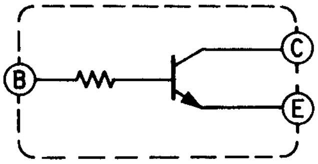


1. Collector
2. Collector
3. Base
4. Emitter
5. Base

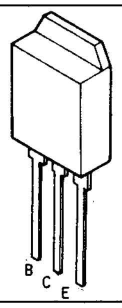


DTC124TK : Q657
DTC143TK : Q851

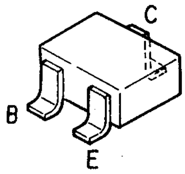


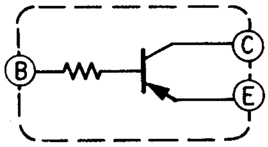


2SD1251 : Q704

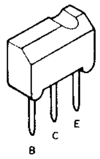


DTA114T : Q710





2SD973A : Q852



2SB941 : Q1002